

Housing and Community Services ACT

Northbourne Housing Precinct, Canberra

DRAFT Conservation Management Plan



Issue	Description	Date.	Issued By
А	Draft for Review	15/03/12	GB/CA
В	95% Draft	28/03/12	GB/CA
С	Amended	31/07/12	GB/CA
D	Amended	13/08/12	GB/CA
E	Amended	26/03/13	GB/CA

Graham Brooks & Associates Pty Ltd Incorporated in NSW Architects, Planners & Heritage Consultants Architects, Planners & Hentage Cor 71 York St, Level 1 Sydney 2000 Australia Tel: (61) 2 9299 8600 Fax: (61) 2 9299 8711 Email: gbamain@gbaheritage.com www.gbaheritage.com

ABN: 56 073 802 730 ACN: 073 802 730

Nominated Architect: Graham Leslie Brooks NSW Architects Registration: 3836

Contents

1.0	Introduction	6
	1.1 Context of the Report	6
	1.2 Site Identification	7
	1.3 Existing Heritage Recognition	9
	1.4 ACT Heritage and ACT Housing	
	Objectives	9
	1.5 Author and Acknowledgements10	
	1.6 Documentary Sources10	
	1.7 Report Limitations1	
	THE POPULE CHINACION CONTROL OF THE POPULATION O	•
2.0	Contextual Development of Canberra,	
	1900-193912	2
	2.1 Rural Landscape of the Molonglo Valley.12	
	2.1 Rural Landscape of the Molongio Valley. 12	
	· ·	
	2.3 Canberra- Early Housing19	y
	2.4 Canberra - Interwar Planning and	_
	Housing Development19	9
3.0	Context Within International Modernism,	
5.0		_
	1915-193926	j
	3.1 The Garden City Movement in	
	Germany and England27	
	3.2 European Modernism: 1920s32	2
	3.3 Large-Scale European Housing, 1920s4	1
	3.4 The International Architectural	
	Exhibition, Sydney, 19274	4
	3.5 Modernist Houses in 1930s England 48	
	3.6 Australian Architects Abroad during	
	the Interwar years49	9
	3.7 Ancher and Domestic Modernism	
	in Post-War Sydney5	3
	The society and syundy minimum.	•
4.0	Canberra in the Post War Context,	
	1945-195957	7
	4.1 The Evolution of Medium Density	
		_
	Flats in Post-War Canberra57	1
	4.2 National Capital Development	_
	Commission, 195773	3
5.0	Northbourne Avenue Housing Group 195977	7
0.0		
	5.1 Establishing the Project: Introduction77	1
	5.2 NCDC Selection and Appointment	_
	of the Architects	
	5.3 The Design Brief88	
	5.4 Master Planning88	
	5.5 Design Development99	
	5.6 Tendering and Re-Tendering100	J

Contents

	5.8 5.9 5.1 5.1 5.1	Construction	117 128 129 130 131 3132
6.0	6.2 6.3 6.4 6.6 6.7 6.8 6.8	ourne Housing Precinct	134 136 136 138 141 143 144 163 163
7.0	7.2 7.2 7.3 7.4	Introduction	171 172 173 179
3.0	8.3 8.3 8.4 8.5 8.6 8.7	Policy Formulation	182 183 184 185 190 192
		Developitietit	134

Contents

9.0	Conservation Policies200
	9.1 Introduction200
	9.2 Principal Conservation Policy
	Framework200
	9.3 Standardised Conservation
	Terminology201
	9.4 Conservation of Significant Fabric
	and Spaces202
	9.5 Upgrading Existing Dwellings203
	9.6 Setting, Landscape and External
	Features204
	9.7 Increased Residential Density205
	9.8 Massing and Design of New Buildings207
	9.9 Carparking and Vehicle Access207
	9.10 On-site pedestrian movement207
	9.11 Colours and Finishes208
	9.12 Access and Facilities208
	9.13 Appropriate Skills and Experience208
	9.14 On-going Maintenance Regime208
	9.15 Heritage Interpretation209
	9.16 Review of the Conservation
	Management Plan209
10.0) Bibliography210

Introduction

1.0

1.1 Context of the Report

This Draft Conservation Management Plan (CMP) has been prepared in the context of a large scale conservation and development proposal for the Northbourne Housing Precinct at Dickson and Lyneham on behalf of Housing and Community Services.

This report has been issued in draft form to accompany a submission by Ancher Mortlock Woolley with the understanding that further edits are in process owing to a recent change in design direction. As an interim document, this Draft CMP should be read in association with the accompanying Master Plan, which provides an overview of the revised scheme. In instances where the Draft CMP is at variance with the Master Plan, the Master Plan is to be considered the principal document.

The CMP is intended to assist the ACT Heritage Unit review its analysis and conclusions as part of their work in progressing the current nominated status of the place towards consideration for full listing under the ACT Heritage Act 2004. The ACT Heritage processes run in parallel with the preparation of the full CMP and the consideration of the conservation and development project by the relevant ACT government agencies.

An initial Heritage Assessment component was released following a preliminary presentation to some members of the ACT Heritage Council and Heritage Unit staff on 9 September 2011 and a further discussion with the Heritage Unit on 17 November 2011.

The Northbourne Housing Precinct at Dickson and Lyneham in the northern suburbs of Canberra, commenced in 1959, was one of the first medium density housing projects developed by the newly appointed National Capital Development Commission (NCDC). It was designed by Sydney Ancher, Senior Partner of the widely respected architectural firm Ancher Mortlock & Murray. Despite extensive flat building project since the late 1940s, Canberra was suffering severe shortages of housing, particularly in the face of a major government policy to transfer large numbers of public servants to the city. The NCDC adopted a policy of creating large scale subsidised housing projects, designed and built to very strict standards and budgets, as the most efficient delivery mechanism. The project was given special emphasis by the NCDC for its role in creating an important civic presence at the northern gateway to Canberra on Northbourne Avenue, at the same time as it rolled out extensive residential home prejects.

The Northbourne Housing Precinct, with its collection of approximately 170 medium density dwellings stretching for some 500 metres on either side of Northbourne Avenue comprises five distinctive groups of Post—War International Modernism style houses and

residential flat buildings. The geometric patterns created for the various housing types, with their varying relationships to shared open spaces, separation of pedestrian and vehicle movement and rectilinear forms bear a unique and striking resemblance to the large scale modernist public housing projects undertaken throughout Germany in the 1920s and early 1930s. The building patterns and cohesive architectural expression were complemented by a rigorously designed landscape character to the Northbourne Avenue frontage. In the 1970s the complex became public housing and the distinctive overall context of the precinct and character of the adjacent streetscapes, particularly De Burgh Streets, continued to be upgraded with subsequent planting schemes.

Listing as a Nominated Place on the ACT Heritage Register generates a statutory requirement for the heritage protection and management of the recognised heritage values of the place. The Conservation Management Plan will guide the conservation of the Precinct as it moves into a contemporary development context.

Housing and Community Services consider that the useful life of the buildings as social housing has reached its conclusion. There are a number of long standing deficiencies with the accommodation types, and concentrations of public housing, such as the Northbourne Housing Precinct, are not supported by the Public Housing Asset Management Strategy 2012-2017. The existing density of development on such a prime site, while considered "high" in the early 1960s, is now regarded as well below that appropriate for Northbourne Avenue as one of the most important main avenues in Canberra, as set out in the Territory Plan.

For Housing and Community Services, a key project objective, within a suite of planning and heritage constraints and opportunities, is to optimise the potential financial yield from the redevelopment of the site for private sector housing, thereby generating funds for contemporary public housing projects elsewhere in the ACT. The principal mechanism for this process is to develop a significant increase in the scale and density of residential development within the Northbourne Housing Precinct.

1.2 Site Identification

The Northbourne Housing Precinct stretches for some 500 metres on both sides of Northbourne Avenue between Murdoch Street and Macarthur Avenue, Lyneham and between Morphett Street and Wakefield Avenue, Dickson. The Dickson sites are generally contiguous although separated by the Canberra Visitors Information Bureau building and parking area, and by the small roadway between Sections 1 and 12 in Dickson.

The Precinct covers a number of land parcels. Those on the Dickson side each contain a different housing type. The single parcel on the Lyneham side contains three distinctive groups of buildings. The four storey Bedsitter Flats located at the northern end of the site, in both Dickson and Lyneham, are identical in design.

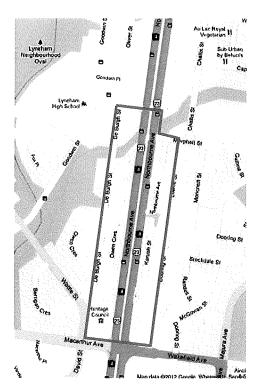


Figure 1.1
Map showing the approximate site boundaries
Source: googlemap.com/



Figure 1.2
Aerial montage of the subject site
Source: NSW Land and Property Information

Dickson

• Block 4, Section 1 The three storey Karuah Maisonettes, facing directly onto Northbourne Avenue

Block 1, Section 12 The single storey Garden Flats

• Block 41, Section 6 The four storey (Dickson) Bedsitter Flats

Lyneham

• Block 51, Section 6 The three storey Owen Flats, two storey de Burgh paired houses and the four storey (Lyneham) Bedsitter Flats

1.3 Existing Heritage Recognition

The Northbourne Housing Precinct has been nominated for listing on the ACT Heritage Register, providing full legislative protection for the existing heritage values of the place.

The Northbourne Housing Precinct is also included on the Australian Institute of Architects Register of Significant Twentieth Century Architecture, has been classified by the National Trust and was entered on the Register of the National Estate, indicating an important level of public and professional interest in the complex.

1.4 ACT Heritage and Housing and Community Services Objectives

1.4.1 ACT Heritage

The Nomination prepared by the ACT Heritage Unit carries the following primary objective for the Northbourne Housing Precinct:

The guiding conservation objective is that the Northbourne Housing Precinct shall be conserved and appropriately managed in a manner respecting its heritage significance and the features intrinsic to that heritage significance, and consistent with a sympathetic and viable use or uses. Any works that have a potential impact on significant fabric (and / or other heritage values) shall be guided by a professionally documented assessment and conservation policy relevant to that area or component (i.e. a Statement of Heritage Effects – SHE).

1.4.2 Housing and Community Services

Housing and Community Services is fully aware that the useful life of the buildings as public housing has reached its conclusion. There are a number of long standing deficiencies with the accommodation types that require major intervention to bring them to contemporary standards. The existing density of development on such a prime site, while considered "high" in the early 1960s, is now regarded as well below that appropriate for Northbourne Avenue as one of the most important main avenues in Canberra, as stated in the Territory Plan.

For Housing and Community Services, a key project objective, within a suite of planning and heritage constraints and opportunities, is to optimise the potential financial yield from the redevelopment of the site for private sector housing, thereby generating funds for contemporary social housing projects elsewhere in the ACT. The principal mechanism for this process is to develop a significant increase in the scale and density of residential development within the Precinct.

The operational objectives identified for the project comprise establishing principles for the future development of the site and management of change in a manner which:

- Delivers innovative planning and design outcomes which interpret and are evocative of the original aspirations and design outcomes for the precinct
- Are consistent with the aims, responsibilities and strategies of Housing and Community Services for the provision, management and maintenance of public housing properties as established in the "Public Housing Asset Management Strategy 2012-2017."
- Is consistent with principles of economic, social and environmentally sustainable development
- Is consistent with the relevant statutory planning objectives and requirements
- Allows for staged implementation

1.5 Author and Acknowledgements

This Conservation Strategy has been prepared by Graham Brooks, Director, and Dr Christina Amiet, Historian, from Graham Brooks and Associates, Heritage Consultants, with advice from Prof. Ken Taylor, Landscape Architect. Personal commentary from Ken Woolley about the background history of Sydney Ancher, the firm and the times has been vital in gaining a deep understanding of the place.

1.6 Documentary Sources

A number of primary and secondary sources were consulted during the preparation of this report. A comprehensive listing has been provided in the bibliography.

Key primary material included the Northbourne Housing Group files from the National Archives of Australia, together with correspondence and accounts filles made available by Ancher Mortlock Woolley. Additional information was also provided by Prof. Ken Taylor.

Further material was obtained through the ACT Heritage Unit Nomination, and the 2007 CMP by Architectural Projects.

1.7 Report Limitations

This report is limited to the investigation of the European history of the site. Recommendations have been made on the basis of archival plans viewed and inspection of the existing fabric.

Archaeological assessment of the subject site is outside the scope of this CMP.

Several important documents and written records were unable to be located within the time frame allocated to this project. The key items included:

- NCDC Plans and files that complemented the written file records
- Sydney Ancher Report to the NSW Board of Architects at the conclusion of his Travelling Scholarship
- C. Boesen's University of Sydney Honours thesis on Sydney Archer
- Articles by Sydney Ancher published in architectural journals

Contextual Development of Canberra, 1900-1939

2.0

2.1 Rural Landscape of the Molonglo Valley

At the time of Canberra's foundation, the land allocated for the site of the new capital was dominated by the flood plain of the Molonglo River. This river is joined by the tributaries of Sullivan's Creek and Woolshed Creek. Separating these tributaries is the Ainslie-Majura range; opposite, and south of the Molonglo, are Jerrambomberra and Yarralumla Creeks, with their lowlands meeting the broad Molonglo valley floor. In the middle of the land site are three commanding peaks – Black Mountain in the north west, Mount Ainslie in the north east and Red Hill in the south.

Also in the vicinity are several hills which rise 20-30m above the Molonglo flood plain: City Hill; Capital Hill and its north-westerly extension of Camp Hill; and two spurs that run along two fault lines. Of these last, the Acton spur extends into the valley itself, while the second, steeper rise, extends from Capital Hill towards Black Mountain. In the early twentieth century, the lowlands and valleys were covered by an almost treeless grass savannah. There were sporadic pockets of dense eucalypt forest (Black Mountain), light forest growth (Ainslie range) or spare patches of tree growth (Red Hill).¹

This land of the Australian Federal Capital Territory was first occupied by the Ngunnawal people, with the Wandandian to the East. Ngarigo and Walgulu tribes in the South, Gandangara to the north, and the Wiradjuri people in the North-West. Evidence of their use of the land includes camp sites, rock shelters, burial sites and engravings. Domestic arrangements tended to vary between rock shelters, and temporary shelter structures set up at campsites, but in 1770 Sir Joseph Banks observed that "many Indian houses and places where they had slept upon the grass without the least shelter,"2 suggesting that shelters may not have been constructed at all campsites. The 'flimsy seasonal affairs' were constructed using green bushes laid against a low horizontal branch, or against a pole set between two forks. Bark huts were built in the bushland, but those groups near a settler's homestead tended to opt for more temporary bough shelters to keep off the rain, more "simply shelters made of a few sheets of bark put against a pole on the windy side."3 Camp sites were usually located in areas that were somewhat sheltered from strong winds and with ready access to a source of water.

These forms of housing bore similarities to the kinds of accommodation utilized by other regional clans, such as those around the Sydney basin. In 1788 Surgeon Wogan reported that:

¹ F. Fischer, Canberra: Myths and Models, p.16

² Cited in L. Gillespie, Aborigines of the Canberra region, p.47

³ Gillespie, Aborigines of the Canberra region, p.47

"It does not appear that these poor Creatures have any fixed Habitation, sometimes sleeping in a Cavern of a Rock, which they make as warm as an Oven by lighting a Fire in the middle of it, they will take up their abode here, for one Night perhaps, then in another the next Night, at other times (and we believe mostly in Summer) they take up their Lodgings for a Day or two in a miserable Wigwam, which they make of the bark of a Tree, these are dispersed about the Woods We met with some that seemed entirely deserted or left for any other Tribe, that might want another Lodging, indeed, it seems pretty evident that their Habitations, whether Caverns, or Wigwams, are common to all, and alternatively inhabited by different Tribes.... "4

When Europeans began to establish themselves in the Canberra area, they knew the local Aboriginal people as Kamberra', 'Kghambury', 'Nganbra' and 'Gnabra', which shares some resemblance to 'Canberra' – the name eventually given to the new capital.⁵

2.2 The Griffin Plan: A New National Capital, 1927

The selection of a site for Australia's national capital was underway in the early years of the twentieth century, with a number of proposals submitted and both Victoria and New South Wales keen to gain an upper hand in the decision-making process. Conditions were set that at the time looked promising to New South Wales but ultimately weighed in Victoria's favour, with the ruling that:

- 1. The site of the capital was to be "distant not less than one hundred miles from Sydney
- 2. Until the seat of government was ready for occupation, Parliament would meet in Melbourne.⁶

In 1901, a conference was held to "discuss questions relating to the laying out and building of the Federal Capital." Much of the discussion was dominated by City Beautiful advocates, but the core concepts were best expressed by George Sydney Jones:

"We are probably all agreed on general principles as to what the plan should be – for instance – that the streets should be wide and tree-planted, that the circus, the square and boulevard, straight and curved lines, park lands, gardens and the like should find their proper places; that the public, semi-public and private building blocks should be disposed in due relation one to the other on sites best adapted for each, and with due regard to the future expansion of the city."⁸

⁴ Cited in V. Attenbrow, Sydney's Aboriginal Past, p.106

⁵ http://www.informationcentres.com.au/information/canberra/history-of-canberra/canberra-aboriginal-history.html

⁶ Fischer, Canberra: Myths and Models, p.9.

⁷ Reid, Canberra Following Griffin, p.11

⁸ George Sydney Jones, cited in A. Freestone, Model Communities, p.116

Prolonged discussions, however, failed to result in a decision; a Royal Commission established in 1903 similarly failed to agree on a location for the new city. Eventually, in 1906 the New South Wales government indicated it was amenable to surrendering land in the Canberra area for the establishment of the Federal Capital Territory.⁹ By the following year, the Garden Cities and Town Planning Association saw the Canberra project as a heaven-sent opportunity to create a garden city that was "beautiful and health-giving and ennobling to many generations." ¹⁰

District surveyor Charles Scrivener was appointed to survey the nominated land, and identified a likely site for the new capital, suitable for "a beautiful city, occupying a commanding position, with extensive views, and embracing distinctive features... The site will demand most careful consideration from a scenic standpoint, with a view to securing picturesqueness, and also with the object of beautification and expansion."¹¹

After further delay, the Federal Capital Territory of 2,356 square kilometres was officially designated on 1 January 1911.¹²

2.2.1 Griffin's Design

The design for the new city was to be determined through a competition for a city plan. However, the eventual design was less that of the winning entry and more properly a hybrid which had been heavily modified to reflect outside interests and influences. This successful design has been in recent years more properly considered a suite of documents known as the Griffin Plan. These plans were prepared by Walter Burley Griffin and Marion Mahoney Griffin over the course of a decade and were intended to shape the original design into 'a buildable city.' ¹¹³

The initial Competition Plan established the purest of the Griffins' design concept; this became successively diluted through subsequent amendments to incorporate the Australian suburban ideal, principles of space design, transportation planning, and urban structure, 14 set amongst low density 'horticultural suburbs' and with a backdrop of agricultural hinterland consisting of market gardens, forestry plantations and pastoral practices. 15

The notion of using a competition to select a city design had been intended from early on in the discussions. It was heavily advocated by town planner John Sulman, who argued that a worldwide competition was essential to avert the risk of the city's design "drift[ing] into the hands of permanent officials whose knowledge of city planning and its possibilities was conspicuous by its absence" and who thought it unlikely that "the best result would be attained



Figure 2.1 The 1911 plan for Canberra, prepared by Walter Burley and Marion Griffin Source: Reid, *Canberra Following Griffin*

⁹ http://www.canberrahouse.com/2006/11/05/short-history

¹⁰ Freestone, Model Communities, p.116

¹¹ Cited in Reld, Canberra Following Griffin, p.13

¹² http://www.canberrahouse.com/2006/11/05/short-history

¹³ National Capital Authority (NCA), *The Griffin Legacy*, p.11

¹⁴ Fischer, Canberra: Myths and Models, p.1

¹⁵ NCA, The Griffin Legacy, p.39-40

by local effort owing to lack of experience." ¹⁶ Prospective entrants had been advised to review the *Transactions of the Town Planning Conference of the Royal Institute of British Architects 1910*, which summarized the main trends in town planning and which conveniently included a paper by Sulman on the anticipated "Federal Capital of Australia." Other significant contributors included 'the father of the Garden City movement' Ebenezer Howard, and advocates of the City Beautiful movement, Charles Robinson and Daniel Burnham.

Sulman's preference was for an indicative radial plan, with a focus on Parliament House situated inside a circular avenue. A low-density garden city model, Sulman's vision for the new capital included distinct precincts, garden suburbs, adequate provision for transportation networks including a railway, and the laying out of wide streets which intersected "with radial communications to the centre and to every other part of the city, thus carrying out the cardinal principle of the spider's web...." ¹⁷

In contrast, Walter and Marion Griffin's submission for the competition was both organic and geometric in nature.¹⁸ Reid's analysis of their submission notes that:

"The Griffin reports say little about geometry and yet this is the most striking attribute of their city plan. The competition conditions drew attention to Mount Kurrajong in words and by placing it on the centre line of the base map grid. A study of the panoramic painting provided to competitors shows the striking conical profile of Mount Ainslie to the north-east. Both hills made a strong impression on Griffin who drew one decisive line, the Land Axis, south-west to north-east from Mount Kurrajong to Mount Ainslie. By tying the design into the three-mile axis between these two hills Griffin locked the city to its site. The Land and Water axes, were not considered 'primarily thoroughfares, but give a connected park or garden frontage for all the important structures...with scope for artistic embellishment, little hampered by utilitarian limitations, affording the greatest ease and comfort for observation and appreciation of the Capital.' 19

The second line was drawn at right angles to the first, from the summit of Black Mountain.... Because this Water Axis lies across the general line of the Molonglo River and extends out into the plain towards the town of Queanbeyan, Griffin described it as more marked and greater than the Land Axis.... Griffin [regarded the axes] not as thoroughfares but as giving a connected or garden frontage to all the important structures. They could be developed, as in the case of the Mall in Washington, with scope for artistic expression, unhampered by utilitarian limitations, affording the greatest ease and comfort for observation of the capital. From the great cross formed by these two axes the whole geometry of the city grows....

¹⁶ Cited in Fischer, Canberra: Myths and Models, p.17

¹⁷ John Sulman, cited in Reid, Canberra Following Griffin, p.32

⁸ Reid, Canberra Following Griffin, p.48

¹⁹ Walter Burley Griffin, cited in Reid, Canberra Following Griffin, p.48

The famous plan is characterized by the geometry of star patterns of avenues converging on centres. The beauty of this arrangement is that it could adapt to variation of topography but maintain its geometric order. The star radials are often irregularly spaced; a simple device to make the geometry more pliable. The plan shows great sensitivity in the placement of centres and avenues in relation to topography..... In the symbolic arrangement of modern institutions and the buildings that house them, the Griffin plan can be regarded as a final flowering of the City Beautiful movement."²⁰

In Griffin's eyes, Canberra was to be a city of tree-lined boulevards set within landmark architecture, that would provide direct access between the key destinations within the city.²¹ The main thoroughfares, which connected the functional centres of Griffin's plan, reinforced the links between the city and its site, and adopted a concave profile to allow visitors views between destinations.²² The geometry of the cross axes and the triangle created a structured framework, with "the axis of Commonwealth/Northbourne Avenues...extend[ing] from Capital Hill for ten kilometres as a processional corridor through the Northbourne Avenue valley. For those approaching the central area on Northbourne Avenue, the corridor passes through the important gateway of City Centre."²³ Griffin considered that the:

"Avenues connecting the two municipal centres with each other and with the executive apex of the federal group form together a triangular circuit connecting the Government departments and recreation groups and connect the Capital, University and Military Groups." ²⁴

Northbourne Avenue, as with the other Main Avenues, was shown by Griffin as having "contiguous terrace buildings and small (fine grain) blocks with rear service lanes which have the highest proportion of individual tenancies to public street frontage."²⁵

Griffin's plan was also distinctive in that it promoted an equitable division of public space, expressed in landscaped boulevards, urban squares, garden suburbs and grand central parks. This would be the result of 'land-planning', where the government was to own the land on behalf of the people and could release the land back to the people. This would achieve "the greatest good for the greatest number," 26 and offered the additional incentive of avoiding land speculation. Revenue generated from land sales was to be re-invested for the public benefit, a policy which tapped into Ebenezer Howard's Garden City principles. In short, the Griffin submission was considered to be a harmonious blend of the best of City Beautiful design and transitoriented planning, with the incorporation of Garden City suburbs. 27

²⁰ Reid, Canberra Following Griffin, pp.62-64

²¹ NCA, The Griffin Legacy, p.72

²² NCA, The Griffin Legacy, p.54

²³ NCA, The Griffin Legacy, p.76

Walter Burley Griffin (1914), cited in NCA, The Griffin Legacy, p.54

²⁵ NCA, The Griffin Legacy, p.84

²⁶ Griffin, cited in NCA, *The Griffin Legacy*, p.30

²⁷ NCA, The Griffin Legacy, p.33

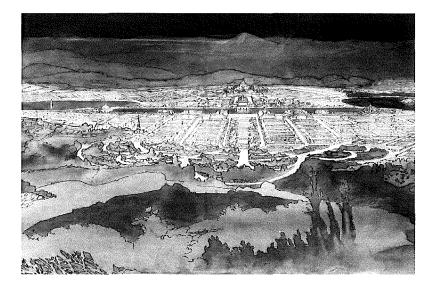


Figure 2.2 Griffin's 1911 'View from the summit of Mount Ainslie' Source: Reid, *Canberra Following Griffin*

With their design demonstrably linked with the topography of the site, ²⁸ the Griffins won the competition. However, a newly appointed Departmental Board composed of senior bureaucrats elected not to adopt any of the submission entries, overturned the decision made by the professional jury and instead endorsed a hybrid plan prepared by the Board itself. ²⁹ This bore out Sulman's initial fears of public servants producing a "hotch-potch conglomerate scheme." ³⁰ Griffin then amended his plan in response to the Board's criticisms, but the decision to choose between his plan and the Board's still had to be made. In October 1913, the Departmental Board was dismissed, Griffin appointed as Federal Capital Director of Design and Construction and his design accepted as the 'Official Plan.'³¹

After several variations to the original plan, a final master plan, Canberra- Plan of City and Environs, was issued in 1918, and was the last plan officially endorsed by Griffin as Federal Capital Director of Design and Construction.³² Griffin found that ongoing issues with bureaucracy had proved stressful, a situation that became exacerbated by the slowing pace of development.³³ Griffin declined to renew his contract in 1920, when the Board was replaced by the Federal Capital Advisory Committee (FCAC).

The FCAC was a six-man committee chaired by John Sulman, and which enabled Sulman to have a more direct role in implementing his personal vision of Canberra.³⁴ The FCAC had been established in order for the Government to put its house in order, as officialdom realized that the pace of development had to be dramatically increased if Canberra was ever to serve as the seat of government.³⁵

²⁸ Fischer, Canberra: Myths and Models, p.20

²⁹ Reid, Canberra Following Griffin, p.104

³⁰ Fischer, Canberra: Myths and Models, p.20

³¹ Fischer, Canberra: Myths and Models, p.20

³² NCA, The Griffin Legacy, p.18

³³ B. Wright, Cornerstone of the Capital: a history of public housing in Canberra, p.3

³⁴ Fischer, Canberra: Myths and Models, p.35

³⁵ Wright, Cornerstone of the Capital, p.3

As part of this initial brief, it was estimated that 177 families and 683 unmarried people would need housing, and that up to 706 cottages and hostels would be required. It was anticipated that private enterprise would in large part be the driving force behind the construction needed to achieve this goal.

It was apparent that Sulman was not a supporter of Griffin's plan and was enthusiastic about replacing it with the Board's 1913 plan as:

The whole [of Griffin's] city plan is so extensive... and calculated for a population of probably 250,000 that it cannot be realized for a century or more.... A nucleus has already been started at the power house [the site south east of Kurrajong and favoured by the Departments since 1909] and I advise that this be developed.... The area is sheltered... bisected by the existing high road from Queanbeyan... streets could be laid out on natural lines and... heavy cuttings and embankments avoided.... By adopting the above suggestions, a compact, easy to build and easy to work city would be obtained, in contrast to a scattered, expensive and hard to manage settlement if commenced to the north east of civic centre.³⁶

The FCAC ignored Griffin's arguments in relation to subdivisions and 'neighbourhood groups', opting instead to follow more mainstream planning doctrines such as those endorsed by Sulman. Other key figures in the early residential development of Canberra were Sulman's fellow Committee member and Commonwealth Surveyor-General J.T.H. Goodwin, who oversaw the detailed planning and survey work, and Superintendent of Parks and Gardens T.C.G. Weston, who was considered to have a 'decisive' influence on the Committee. None of the members of the Commission were professional town planners.

Although Sulman and the FCAC was obliged to keep to the basics of Griffin's plan, it nonetheless managed to circumvent it by changing the design and siting of buildings, and by deferring the construction of permament Parliament and government department buildings on the grounds of the struggling economy. It began to twist the already-established policies and influence the direction of development so thoroughly that within a decade it had resulted in a city which Griffin considered "violated [his] aesthetic, social and economic principles in almost every act." The FCAC redefined the vision of Canberra as "a garden town, with simple, pleasing, but unpretentious buildings" and with the majority of residents housed in "suitably disposed cottages of permanent construction." This direction was driven by Sulman, who was confident that the best option for residential development was detached dwellings set within large garden spaces.³⁸ In effect, the decisions this group made formed the background from 1925 for the Federal Capital Commission (FCC) which in turn would drive a continuing garden town policy.39 Sulman's planning principles ultimately drove not only the early development of the Canberra suburbs, but also development in the post World War II era.40

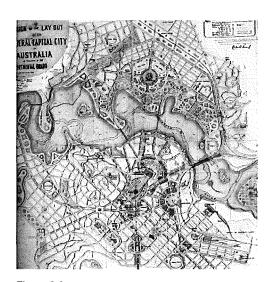


Figure 2.3 The Board's Plan, 1912 Source: Reid, *Canberra Following Griffin*

³⁶ Sulman, cited in Reid, Canberra Following Griffin, p.154

³⁷ Cited in P. Freestone, The Early Canberra House: 1911-1933, p.14

³⁸ Taylor, Canberra: City in the Landscape, p.50

³⁹ Freeman, The Early Canberra House, p.15

Taylor, Canberra: City in the Landscape, p.53.

2.3 Canberra - Early Housing

Following selection, the site of Canberra had become the home of a series of scattered tents and encampments - now regarded as the 'construction camp phase.' Hostels, construction camps and guest houses were vital to the survival of the early Canberra community for many decades. Crucially, their importance reflected the itinerant nature of Canberra's population and emphasised the extent to which the town was dependent on its building and construction industry.41

Within the construction camps there were clear socio-economic divisions. Those camps reserved for labourers tended to be of lower quality and standards than those intended for technical personnel such as tradesmen, engineers and surveyors. The camps were in operation far longer than initially anticipated, with some such as the Causeway, Capitol Hill and Russell Hill active into the 1930s and 1940s, while the White City Camp (on the site of the present-day Canberra School of Music) was at its peak in the mid-1920s when the Sydney and Melbourne Buildings and associated facilities were under construction at Civic Centre. Other camps had a considerably shorter life span associated with specific building and development projects, lasting only as long as the project took to complete.42

Of the early residential projects, the most significant was the Bachelors' Quarters, which was constructed and opened in 1912. This was soon renamed the Acton Guest House (later Lennox House), and was repeatedly altered and extended⁴³ in several stages from 1911 to 1927 in an attempt to accommodate demand. Intended as a single mens' quarters, but initially officially known as the Professional Officers' Mess, it housed both residents and regular important visitors.44

2.4 Canberra - Interwar Planning and Housing Development

The direction of development during the interwar years was influenced by a number of factors. During this period, the city saw the construction of an official precinct in Acton, a number of government hostels, several small estates of government houses in Kingston and small subdivisions at the Causeway and Yarralumla. Of those subdivisions commenced before 1930, it is believed that Sulman either had the final say in the decision-making, or else indirectly influenced the early phase of development.45 These first suburbs were exercises in social segregation, with each development assigned a different character as a "destination for different categories of citizens."46 As the Canberra Illustrated phrased it:



Acton Guest House, 1912

A. Foskett, Canberra's Hostels, Hotels and Guest Houses: a part of our heritage, p.1

Foskett, Canberra's Hostels, Hotels and Guest Houses, p.1

A. Gugler, Canberra's Construction Camps, Early Houses and Selected Documents, p.250

http://heritage.anu.edu.au/index.php?pid=1117

Freeman, The Early Canberra House, p.16

Freeman, The Early Canberra House, p.16

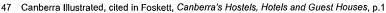
Will Canberra some day be known as the city of snobs? At the present time the signs are here. First we have the 'guests' at the Hotel Canberra, then the denizens of Acton and so on through Blandfordia, Eastlake, Westlake, the Hotel Ainslie (Gorman), down to the Causeway and Molonglo Camps and the tradesmen's messes until finally we reach the labourers' camps at Eastlake and Civic Centre, the home of the lost and outcast... it is easier for a camel to go through the eye of a needle than for an artisan to be accommodated at the Hotel Ainslie."⁴⁷

In this the city plan was not so different from that espoused by Griffin, who had incorporated a north side 'manufacturing suburb' and sprawling 'society suburbs' planned on informal park-suburbs lines for the 'leisured class' near Capital Hill. 48 The FCAC also retained other aspects of Griffin's design, with a 'civic' quarter nominated north of the river, and 'official' zones to the south. A more finely detailed socio-economic stratification was evident in the different sized housing blocks, frontage widths, the size and quality of government housing, and lease covenants specifying minimum costs of private houses, as at Corroboree Par, where weatherboard structures were to have a minimum building cost of £700.49

A new era in the provision of 'hostel' accommodation began with the commencement of work on No 1 Hostel in 1922. By its completion in 1924, its name had been changed to the Hotel Canberra and it was reserved for accommodation of senior administrative staff only. It joined three other establishments that had been built to house permanent boarders, public servants awaiting more suitable housing accommodation and 'itinerants.' These were the Hotel Acton, Hotel Ainslie and the Bachelors' Quarters at Acton. Prior to the Hotel Canberra opening some senior administrative staff were accommodated in Government House at Yarralumla.⁵⁰

On 1st January 1925, the FCAC was replaced by the Federal Capital Commission (FCC), which in effect meant a whole new phase of opportunity for the development of Canberra. By the time of its abolition, the FCAC could claim responsibility for a total of 126 houses, located in four residential zones; some cottages, as in Ainslie, were still unfinished at the time of handover to the FCC. Those houses constructed during the 1920s were predominately single storey, low density detached dwellings, set on large blocks of land.

The FCAC had been marginally more successful with hostel housing, such as the Hotel Canberra and the Hotel Ainslie (later the Olims Canberra Hotel) and other hostels in Brisbane Avenue and Telopea Park underway.⁵¹ Unfortunately, the FCAC was viewed as having failed in its mission. This failure to keep up with the demand for housing was due in part to a post-war economic slump, which severely limited government construction projects – with a war debt of 364 million pounds and the pressing needs of 350,000 returned serviceman, both interest in, and development of Canberra, languished.⁵²



⁴⁸ Cited in Freeman, *The Early Canberra House*, p.16



Figure 2.5
The first group of permanent homes in Braddon, early 1920s
Source: Wright, Cornerstone of the Capital



Figure 2.6 Cottages under construction in Oakley and Parkes, c.1925 Source: National Archives of Australia

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd

⁴⁹ Freeman, The Early Canberra House, p.16

⁵⁰ Foskett, Canberra's Hostels, Hotels and Guest Houses, p.2

⁵¹ Wright, Cornerstone of the Capital, p.4

⁵² Reid, Canberra Following Griffin, p.145

The newly-installed Federal Capital Commission (FCC) had a huge task ahead of it. Inheriting a town in which there was not one vacant house, its brief was to prepare for the transfer of the Seat of Government to Canberra by June 1926. Originally, it had been intended that only secretariats of key departments be transferred as part of this first phase, along with those who needed to be within immediate proximity of the Ministers. However, in November 1925 the Federal Capital Commission was told to plan for the transfer in 1927 of all staff of the Prime Minister's Department, Treasury, Attorney-General's, and Home and Territories, the headquarters of Trade and Customs and Markets and Migration, and for secretariats of Postmaster-General's, Defence, and Health. Instead of the designated 607 officers, the FCC suddenly found itself responsible for providing housing for 1,117 -or more -public servants.⁵³ The first transfer of public servants was to consist of:

643 Departmental Officer 83 Parliamentary Officers 111 Members of Parliament 1000 Government Printer's staff 23 Government House Officers and sundry.⁵⁴

The 1925-1926 Annual Report for the Federal Capital Commission stated that:

A special Department of the Commission (the Commissariat) has been established for the management of hotels and quarters. At the present time these include the Hotel Canberra, Hotel Ainslie (Gorman House), and the Bachelors' Quarters. Arrangements are being made to increase the available accommodation by the equipment and opening of additional quarters at Eastlake, which will eventually house the staff of the Government Printing Office upon its transfer to Canberra, but which in the meantime will afford a very welcome addition to the accommodation available for Commission employees. The patronage of both hotels has greatly increased during the year, particularly at Hotel Canberra, where additional accommodation was provided by the completion and opening of the southern half of the building. This hotel has been a great convenience to the community of Canberra, providing a suitable abode for persons having business with the Commission or in relation to the development of their leases, for senior civil servants, and for local residents not desiring to live in houses. Its convenience as a meeting place has been of special value to all inhabitants and visitors to Canberra, in view of the fact that no suitable alternative 'rendezvous' was available previously.

"Hotel Ainslie (Gorman House) has been largely occupied by the staff of the Commission, but limited accommodation for visitors at a more moderate tariff is available, and this has been appreciated particularly by persons engaged in building and other activities which demanded their presence in Canberra for longer periods.

⁵³ Wright, Cornerstone of the Capital, p.6

⁵⁴ Memorandum, 14 September 1925, A/1 27/17113 part 1, National Archives of Australia

The Commission has extended the accommodation of the Bachelors' Quarters, Acton, to replace the unsatisfactory arrangement of tents, and provision for 120 persons is now made at this establishment. The available accommodation in Canberra at a moderate tariff is not at present adequate, but this will be relieved by the building of four boarding-houses, for which the Commission has now made arrangements.

Consideration has been given, in connexion with the next sale of leases, to the advisability of permitting private enterprise to obtain sites and erect residential accommodation for the public, as it is certain that most of the accommodation which the Commission now has available will be absorbed during 1927, after the transfer of Parliament and the Administrative Departments."55

It was apparent that housing was a critical issue, and that private agencies and interests could not be depended upon to provide accommodation for those public servants to be transferred from Melbourne. The Minister for Home and Territories had reported to Cabinet in 1924 that "the Government must, therefore, be responsible for housing its officials who are transferred from Melbourne, and who are on a different footing from the commercial population, and will suffer some hardship and inconvenience on their compulsory transfer to the seat of Government." 56

The Commission quickly offered opportunities for private enterprise construction, but also began a program of residential development. By the middle of 1925, 20 wooden portable cottages had been completed at the Causeway for construction workers, another 60 were nearing completion and a further 38 under construction were expected to be complete by September 1925. This was the first major construction project initiated by the FCC, but it soon moved into a program of mass construction of houses for public servants. By mid-1926, there were 300 houses being built in South Ainslie (now Reid), Telopea (Barton) and Manuka under contract to the FCC, most of the initial 50 brick Oakley and Parkes houses in Blandfordia (now Forrest) were all but finished, and the FCC was building by day labour 42 timber houses at Acton for its own senior officers. It had finished five timber houses at Westridge (Yarralumla) and four dairy farm cottages.⁵⁷

Other major additions to the stock of accommodation in the 1920s included the Hotel Kurrajong (No 2 Hostel) in late 1926, and the Hotel Ainslie (no 3 Hostel and later Hooker-Rex, now Olim), Beauchamp House, Brassey House and the Hotel Wellington in 1927. Workers' hostels also began operating at the Causeway and on Capital Hill. The Printers Quarters at Eastlake (later Kingston Guest House) had also become available in 1926. The FCC nominated the Hotel Ainslie as accommodation for public servants and Commission staff, but it eventually closed before being leased to private operators. Finally, in 1950, it was sold by the Department of the Interior to private enterprise for £85,000.⁵⁸

⁵⁵ Cited in Foskett, Canberra's Hostels, Hotels and Guest Houses, p.3

⁵⁶ Cited in Wright, Cornerstone of the Capital, p.6

⁵⁷ Wright, Cornerstone of the Capital, p.9

⁵⁸ Foskett, Canberra's Hostels, Hotels and Guest Houses, p.2

Several options were made available to those public servants transferring from Melbourne. They were able to become public housing tenants by renting houses from the FCC over 20-25 year periods; purchasing properties from the Commission; or building or buying their own residence. There proved to be a decided lack of interest in the options to purchase accommodation, despite generous incentives to buy or build rather than rent; it was felt that "Owing to the lack of support by private enterprise, the Commission was compelled to assume the entire responsibility for providing residential accommodation, not only for the whole of the transferred public servants, but also for its own workmen and considerable staff." 59

The transfer of the first wave of public servants from Melbourne to Canberra was carried out, with the majority of the staff not best pleased at either the housing options or lifestyle generally. Complaints began to filter through against the FCC's policy of designating selected suburbs to various ranks of public servants, based on both salary and status; by 1927, these complaints were heard in Parliament. The social segregation was condemned, with the warning that "the time is not too far distant when in Canberra there will be a caste system worse than that in India." It was evident through the leasing arrangements and site planning practices that specific districts were intended for certain income groups and social cliques; this was merely a continuation of the earlier design.

This initial move of public servants to Canberra for the 1927 opening of Parliament cemented into place a unique, in Australia at least, class structure – most residents living in publicly owned housing, but divided into different suburbs according to occupation and income. One third of the c.3000 construction workers were still living in tents, the remainder in barracks accommodation at the old Molonglo internment camp, the temporary wooden workmen's huts built under the FCC and FCAC programe, or, in the case of about 800, owner-built humpies. They were denied access to the cottages being built by the government for officials and public servants.⁶¹

In its annual report for 1927 the FCC commented that "of the cottages being erected, the greater proportion are in brick areas, but the Commission has developed special areas in which timber cottages are being erected, and the demand for these houses has been so considerable that it is proposed to increase the number."

In that year, the FCC approved construction of 545 government houses, 239 of which had been completed by year's end. The government housing was being built at Blandfordia, Telopea Park, Eastlake (Kingston), Ainslie and Westridge, with staff houses being built at Weston Creek, Stromlo, Cotter, and Government House grounds, plus eight farm cottages. Permits for the construction of private dwellings was markedly impoved this year, with 48 approvals granted for houses at Ainslie, 11 at Blandfordia, 32 at Eastlake and 19 at Red Hill.

⁵⁹ Cited in Wright, Cornerstone of the Capital, p.45

⁶⁰ Cited in Fischer, Canberra: Myths and Models, p.45

⁶¹ Wright, Cornerstone of the Capital, p.13-14

By the middle of 1928 there were 728 government houses built and tenanted to public servants in Canberra, as well as 200 'framed houses' for construction workmen. About another 100 workmen and families were housed in tenements, which, although provided with all services, were regarded as of a lesser degree of permanence, and were gradually demolished as additional residences became available in the various city areas. The tent camps also were gradually phased out during 1927-1928.

In addition to this growing building stock, the Ainslie Hotel, the Wellington, and Acton, Brassey and Beauchamp Houses were all completed during 1927-1928, adding to the significant population in hostel and hotel accommodation. Staff of the Commission occupied 282 houses, 334 were occupied by other public servants, and 30 were occupied "by members of the general public who were not otherwise able to secure accommodation." This was the first break in the strict policy that government housing was for government employees only.

A second change was the decision by the FCC in 1929 to approve flats in selected areas as well as several semi-detached two storey residences in Reid and Ainslie; these were constructed by way of experiment, to test public opinion. The nature strips along these early suburbs were planted using trees of only one species – Sulman was disparaging of any deviation, as "nothing looks worse than a heterogeneous or broken line." Sulman also had decidedly strong opinions as to unsightly views of telegraph, telephone and power poles and wires.

These two departures from policy were indicative of a significant change in the economy. The building boom of the past few years began to falter under the pressure of the looming Depression. In 1927-28, only 24 applications were made to build houses privately, down from 110 the previous year. As of 30 June 1928, the Commission had only two houses under construction. The Depression and looming World War led to a period of stagnation and a pessimistic outlook for the future of the city.

As development of the capital was wound back the FCC's staff dropped from 408 in June 1929 to 285 four months later. With the change of government in 1930, the FCC was wound up amidst criticisms that it had been extravagant and undemocratic, and Canberra reverted to divided departmental control, a state of affairs that was to continue until 1958.

Overall, by the mid-1930s the extent of privately operated establishements in Canberra had been increased with the availability of the Hotels Civic and Kingston and the leasing to private operators of the Brassey, Beauchamp and Acton Guest Houses and the Hotel Canberra.

⁶² Cited in Freeman, The Early Canberra House, p.18

⁶³ Wright, Cornerstone of the Capital, p.18

⁶⁴ Foskett, Canberra's Hostels, Hotels and Guest Houses, p.5

In its final report, the FCC had warned that:

It would be nothing less than a tragedy to subdivide the activities of the Commission and distribute them among two or more departments."65

This proved to be prophetic, as control over the growth of Canberra was distributed between four different government departments. An Advisory Council was created in 1930, as well as a National Capital Planning and Development Committee in 1938 - both agencies proved little more than figureheads, and the agencies effectively making the crucial decisions were staffed by permanently appointed officials, of the kind that Sulman had railed against. Ultimately, in the period leading up to World War II, there were only a few major building developments in the Canberra area - of these, the only one which made a contribution to Canberra's role as a capital was the construction of the War Memorial, which opened in 1941. The most visible outcome of the period was the twenty million trees and shrubs which had been planted by the end of World War II.66

⁶⁵ Cited in Fischer, Canberra: Myths and Models, p.49

⁶⁶ Fischer, Canberra: Myths and Models, p.50

Context within International Modernism, 1915-1939

3.0

The Northbourne Avenue Housing Precinct is notable as a fine work of Post-War International Modernism style architecture, from the hand of the well known architect Sydney Ancher and his firm Ancher Mortlock & Murray. The project produced a rare Australian example of pre-war European modernism executed in the context of a large scale urban housing development, with the twin objectives of creating a major civic design outcome matching the importance of the Northbourne Avenue as an important site bordering the main entrance road to Canberra from Melbourne and Sydney, whilst being created within very strict cost and accommodation standards. It is essential therefore to explore some of the pre-war architectural design and planning influences that led to Ancher being such a successful advocate of modernism in his post war domestic work in Sydney, and to his selection, in 1959, as the architect for the Northbourne Avenue project.

The discussion contained in this section outlines the important role that Le Corbusier played in the development of modern architecture in the early 20th century and of his influence on young architects such as Sydney Ancher. It also highlights the importance of the mass housing projects undertaken across Germany in the late 1920s and, to a lesser extent in Holland, on the design and siting layouts that Ancher developed for Northbourne Avenue in the late 1950s. Large scale housing projects provided opportunities for the architectural theories of leaders such as Le Corbusier and Walter Gropius to be translated by a series of architects including Ernst May, Bruno Taut, Mark Stam and J J Oud as well as Gropius himself, across Germany. Influential European exhibitions such as the International Exhibition of Decorative Arts, held in Paris in 1925, the 1927 Stuttgart Weissenhof Siedlung and the 1931 Berlin Building Exhibition, both coordinated by Mies van der Rohe, combined to consolidate the new architecture across Europe.

Numerous Australian architects and architectural graduates travelled to Britain and Europe in the inter-war decades, often with the assistance of travelling scholarships or with the intention of finding employment. Many worked in the offices of leading modernist architects, including those working temporarily in Britain after leaving politically unstable Germany. In London, Sydney Ancher worked with the noted modernist English architect Joseph Emberton, and Arthur Baldwinson with Walter Gropius. Others worked in America and some in Russia. All absorbed ideas and expanded their knowledge previously gained only from journals, publications, colleagues and the rare exhibition such as the International Architectural Exhibition held in Sydney and Melbourne in 1927, and organisations such as the Modern Architecture Research Society, of which John Overall and Arthur Baldwinson were members.

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd

NCDC, Housing Project - Northbourne Avenue: Design Brief, Part 1, 59/723, National Archives of Australia.

² Throughout the Northbourne Housing Precinct project, the issue of construction costs for each type of dwelling remained a high consideration. See 59/723, National Archives of Austra

As these architects returned to Australia in the late 1930s, they brought with them ideas and enthusiasm for the new architecture and how it might be introduced into their work. Unfortunately the Second World War interrupted many emerging careers, delaying the flowering of International Modernism in Australia until the post war decades.

3.1 The Garden City Movement in Germany and England

The birth of Australia's new Federal Capital coincided with strong influences in the field of planning and design. Dominant theories included the City Beautiful movement, which hinged upon a unified civic centre. It was a distinct form which saw three-dimensional massing of the city's civic functions arranged in a grand style, and by the use of diagonal boulevards which led to significant landmarks, buildings and features.³ It drew inspiration from beaux arts Paris and Vienna, and found a foothold in the new world, such as in Chicago.

A second, equally strong influence was the British Garden City movement, which had garnered the attention of the architectural and design world as a way to resolve the problems of overcrowded nineteenth century European cities. Taking its name from Ebenezer Howard's "To-Morrow: A Peaceful Path to Real Reform" (1898), the Garden City movement advocated transit-oriented planning techniques including linear garden cities and land-use zoning, with low-density residential planning and garden city principles resulting in changes in planning at the local, regional and national levels. It emphasized the use of green belts, satellite towns and the decentralization of both population and industry.4 The movement was most succinctly expressed by Raymond Unwin's "Nothing Gained by Overcrowding" (1912), which sought to achieve a "more harmonious combination of city and country, of dwelling house and garden."5 It hinged upon the concept of terrace houses with gardens, arranged around a common open space or green.⁶ In the Australian context, it proved an important phase in the development of residential districts,7 with its 'wards' foreshadowing the modern concept of neighbourhood precincts. Howard's plan sought a balance in all things:

Symbolically, the plan was also revealing. Its overall mandala form was representative of unity, harmony and order. With open space at the centre and factories on the periphery, the geography of the contemporary industrial town was inverted. Moreover, the factories indicated – cycle works, printeries, boot manufacturers – were not those of corporate capitalism.⁸

Owen Hatherley's analysis of the Garden City Movement, Revolution in the Garden Cities of To-morrow and Garden Suburbs of Yesterday, summarised Howard's career and the eventual extent of his influence as follows:

³ National Capital Authority, *The Griffin Legacy: Canberra, the nation's capital in the 21st century*, p.36

⁴ Freestone, Model Communities, p.1

⁵ Cited in Freestone, *Model Communities*, p.10

⁶ Taylor, Canberra: City in the Landscape, p.38.

Freestone, Model Communities, p.5

⁸ Freestone, Model Communities, p.12

In 1898 Ebenezer Howard, a stenographer at the Houses of Parliament who regarded himself in his spare time as something of an inventor, 'invented' the garden city in his book "To-morrow, a Peaceful Path to Real Reform," which he republished 4 years later as Garden Cities of To-morrow. This book was typical of a certain kind of Victorian reformism in that it suggested one overwhelming idea as the solution to all the country's ills. He outlines the overcrowding, dirt, disease and poverty of the city, the monotony of the suburbs and the isolation of the countryside and offers a solution that seems too simple to be true – to build new cities which contain the country within them. This would of necessity attract people from the city – at which point the country could re-enter the city, with the slums replaced by parks and gardens.

What really marks Howard out from (Morris, or) other utopian socialists such as Robert Owen, who had organised their own communes and communities, was the realism and practicality of his book. Howard had done his maths, and set down precisely in his book how much it would cost for people to band together and purchase an area of land for the experiment, and how much the city would cost to run and maintain. The Garden City itself would be the sole landlord, essentially meaning the entire city would be owned in common. However Howard wasn't quite a Communist – he tried, in typical late-Victorian style, to fuse Socialism and Individualism, and he had a laudable refusal to wait for the revolution for change. He notes that socialists have a tendency to criticise any attempts at creating what he calls 'new forms' within the old, unjust system. For Howard, the obvious justness of the Garden City would be its own argument for what he characteristically called 'commonsense socialism'.

For all Howard's practicality, he had been rather naïve in assuming that people inspired by the justness of the garden city would just band together and raise the capital themselves. He was right, however, that the idea's simplicity would quickly inspire emulation, and a Garden City Association was formed in 1901. This would be bankrolled by the Quaker philanthropists of the Cadbury family and the Lever company, both of whom had built precursors to the Garden City for their workers at Bourneville near Birmingham and at Port Sunlight near Merseyside, and had as its main spokesmen a coalition of liberal MPs and reformist socialists like George Bernard Shaw. Shaw, who was charmed by Howard's normality and diffidence, dubbed him 'Ebenezer, the Garden City geyser'. In 1903 they settled on Letchworth in Hertfordshire as the site for their experiment. They chose for the architect and planner of the city Raymond Unwin. (As well as his theoretical commitment to class war, another thing marked Unwin out from Ebenezer Howardhis medievalism.)

Unwin and his partner Barry Parker developed a style based on steeply pitched roofs, a lack of ornament, generous gardens and open space, of course, and a tight plan designed to encourage social interaction. Accordingly there would be much enclosed space and courtyards - a typical Letchworth street, would have no hedges to spur on neighbourliness.

In 1907 Unwin was hired by Henrietta Barnett, the patron of Toynbee Hall, an outpost of East End philanthropy, to design a Garden Suburb on the edge of Hampstead Heath.

Although it was bordered on one side by the long, arterial Finchley Road, the Garden Suburb had the heath as its own green belt, and erected a medieval style city wall against the heath to demarcate its boundaries. Unwin's plans were similar to Letchworth, only tighter and more urbane – curiously more city-like in the garden suburb than they were in the garden city.

The Garden City had perhaps its biggest take-up in Germany, where the arts and crafts movement had less of a problem with modernity, and actually offered its services to industrialists in the Deutscher Werkbund. As with Letchworth, it was an idea fought over by visionary utopian socialists, intent on what they called 'lebensreform' via abolishing the difference between city, and country, and more pragmatic businessmen with dreams of a pastoral arcadia that might just produce more productive and less rebellious workers than the 'mietsakerne' or 'rental barracks' popping up all over cities like Berlin.

However, after the First World War, and in radical contrast to the timidity of Welwyn Garden City, the German planners and architects designed for a new world that would make no more gestures at an idealised peasant past. This really begins with the work in Frankfurt of the town-planner and architect Ernst May. Now May was not only influenced by Raymond Unwin's Garden Cities – he had actually moved to Britain for a time (1910) to be trained by Unwin himself, so we might have expected his work to aspire to the dreamlike quaintness of Letchworth or Hampstead. On the contrary, after being appointed planner and city architect to Frankfurt's Social Democratic City Council, he began an unprecedented experiment – one which we could call the Modernist Garden Suburb.9

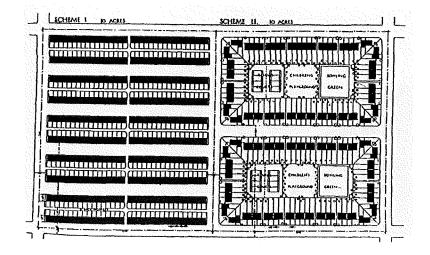


Figure 3.1
Garden city principles versus conventional suburban grid planning
Source: Unwin, *Nothing Gained by*Overcrowding (1912)

⁹ O. Hatherley, Revolution in the Garden Cities of Tomorrow

The Garden City ideal was embraced by Ernst May, who was appointed in 1925 to lead the building department of a major provincial housing welfare association in the eastern city of Breslau, formerly Silesia, now Wroclaw in Poland. Trained under Raymond Unwin and reform architect Theodar Fischer, May was soon engaged to carry out the implementation of a large housing scheme, established by the Ministry of Welfare to provide the less properous members of the local population with healthy and practical, functional houses at low prices. Ideally, the land was to include a small plot of land with each property to allow families to garden and thereby achieve a degree of self-sufficiency in hard times.

As Unwin's protegee, May had drawn upon many of his ideas:

Unwin was responsible for not only the building development plans and the landscape gardening design of the green spaces in the garden cities; he also designed the various housing types and all the urban planning details such as pavements, lighting and enclosures, right down to the benches and letter-boxes. In this way a harmonious organic overall unity was achieved. May absorbed these new ideas and later used them in his own large scale housing projects, employing however a more design vocabulary than Unwin had used at that time.... May also contributed to the translation of (Unwin's) standard work "Town Planning in Practice" in German. Through this intensive professional co-operation there also arose a lifelong friendship with the Unwin family.10

During the period, May:

claimed that he was responsible for the construction of some 3,000 houses throughout the province. Many of his settlements stayed close to the rural traditions of buildings with distinctive pitched roofs arranged in village layouts, drawing from the local cultural identity while referring back to the organisational principles he had learned from Unwin. In accordance with the difficult post war economic conditions, May also developed many of the standardised housing types and building processes that he would later perfect in his large scale projects in Frankfurt.¹¹

The extent of Unwin's influence was clear:

In 1925 May designed, on the outskirts of Frankfurt the Siedlung Bruchfeldstrasse, literally the Bruchfield Street Settlement. This was laid out with landscape gardens, winding streets and plenty of open space, light and air, much as Unwin might have done. The picturesquely pointy roofs though have been sliced off, the chocolate box stucco has been painted with some sort of Mondrian pattern, while rather than using good rustic materials, May used all manner of shiny, industrial railings and balconies. The central courtyard of the Bruchfeldstrasse estate shows many traces of his English precursors, though takes them somewhere radically futuristic that they would never have dared. While one gets the sense that Unwin was always rather unsure about the 'city' part of Howard's work, May's work is entirely modern and urban.

¹⁰ Quring, Ernst May, p.19

¹¹ Quring, Ernst May, p.33



Figure 3.3
Development Plan for the Goldschmieden-Neukirch Siedlung, 1920
Source: Quiring, *Ernst May*

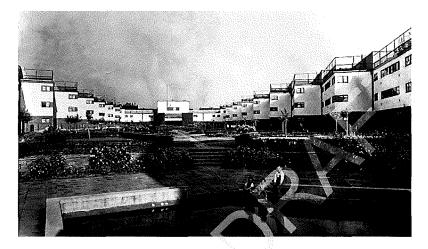


Figure 3.4 Bruchfeldstrasse Siedlung Frankfurt courtyard Source: Martin Filler NY Review of Books 2011

In Frankfurt May would subsequently design, on the outskirts of the city, thousands of dwellings, all in carefully planned and arranged 'siedlungen', with the cafes and shops missing in Hampstead all in prominent places, along with community centres and schools. There would be a constant element of surprise about them, their angularity broken up by patterns, unexpected layouts and dramatic curves and changes of scale, as in blocks of flats like the one in his Romerstadt Siedlung which plays on ocean-liner imagery. Although these were never garden cities, being connected with the city of Frankfurt, they never became a mere suburban sprawl either. 12

In the United Kingdom some early efforts at Modernist Garden Cities were made in Essex, of all places, in the late 1920s and early 30s.

3.2 European Modernism: 1920s

When the National Capital Development Commission was drawing up a list of its preferred architects for the Northbourne Housing Project in 1959, they developed a short list of three Sydney based architects:

- Sydney Ancher and Ancher Mortlock Murray
- Arthur Baldwinson, then practicing as Baldwinson and Twibill
- Edwards Madigan Torzillo and Briggs

The list was quickly reduced to Ancher and Baldwinson by the decision to reserve EMTB for commercial projects. Both Sydney Ancher and Arthur Baldwinson had established reputations in Sydney in the years following the Second World War for their introduction of the European Modernism style of architecture into their houses. By the mid 1950s, Ancher, along with Harry Seidler, had the stronger reputation in residential architecture, based on their successes in the Sulman Awards for Architecture in 1945 and 1951 respectively. Baldwinson also won the award in 1956 for the Hotel Belmont near Newcastle. 13 The NCDC's decision to shortlist Ancher and Baldwinson indicated a strong desire on the part of its dynamic and forceful leader, John Overall, to create a housing complex on Northbourne Avenue, which demonstrated high quality architectural design and planning. Commissioner Overall had known Baldwinson through their membership of MARS, the Modern Architecture Research Society, as well as from his student days at Stephenson and Turner.¹⁴ This established relationship, together with Overall's clear interest in Modernism through MARS, likely heavily influenced the desired architectural style of the proposed new housing group.

Interestingly, neither of the short-listed architectural firms had produced any large scale multiple housing projects. Their reputation had been primarily developed through the single houses that they had designed for private clients in the Sydney region.

Like so many of their young Australian architectural contemporaries, both Sydney Ancher and Arthur Baldwinson had worked and travelled in Europe in the 1930s, becoming great supporters of the Modernism work of architects such as Le Corbusier, Mies van der Rohe, and Walter Gropius. Their architectural awareness had been built on architectural studies undertaken in Australia before their departure with access to current publications and exhibitions.

This section provides a summary of European Modernism and the architectural influences brought home by Ancher and Baldwinson. Although Modernism became widely used in Australia for commercial and institutional architecture this section will concentrate on Modernism's expression in domestic architecture, given the context of the Northbourne Avenue Housing Precinct.

¹³ See Section 5.2

¹⁴ See page 73.

3.2.1 Modernism in Design

In the Introduction to his 1990 compilation of essays published as *Modernism in Design*, Paul Greenhalgh elegantly captured the idea of Modernism, which he chose to call the Modern Movement. From the perspective of the 1990s he was able to perceive two phases in the movement:

- The "Pioneer" phase, from the First World War to the demise of key movements between 1929 and 1933
- The "International Style", opening in the 1930s and continuing into the 1970s. The label was coined for the exhibition organised by Philip Johnson and Henry-Russell Hitchcock at New York's Museum Of Modern Art in 1932

He identifies the 1930s, the period in which Sydney Ancher was working and travelling in Europe, as "confusing years of transition from one state to another, with varying levels of 'pure' Modernism, as it were, in various countries." 15

Ideologically the movement cannot be described so easily but we can say that the first phase was essentially a set of ideas, a vision of how the designed world could transform human consciousness and improve material conditions. These ideas were expressed physically through manifestos, hundreds of prototypes and a handful of realised objects and manifestos. The second phase was less of an idea than a style and a technology; a discourse concerned principally with the appearance of things and with their manufacture. It was expressed far more widely than the first phase, in thousands of buildings and millions of objects, especially after the Second World War. 16

Pioneer Modernism consisted of a series of movements and individuals who addressed themselves to the problem of an appropriate design for the twentieth century. They were very much concerned with three spheres of activity; architecture, furniture and graphics, the former of which undoubtedly held sway. They were not the first to ponder the idea of an appropriate 'modern' style, neither did they invent all of their own ideas, technologies and stylistic mannerisms. Rather, what made them different from anything that had gone before was the holistic world-view they constructed from earlier, disparate ideas, and the absolutist nature of their vision... ¹⁷

In the first instance, activity was most intense and directed in Holland, Germany, France and the newly formed Soviet Union. In all cases, there was a focus of some kind; a journal, institution or gallery, which allowed designers and artists to come together to formulate a position and ultimately a movement.

In Holland, a small group of architects, designers and painters, cut off from the international community by the First World War, created ... a forum for themselves with a movement known as De Stijl. In

¹⁵ P. Greenhalgh, Modernism in Design, p.3

¹⁶ Greenhalgh, Modernism in Design, p.3

¹⁷ Greenhalgh, Modernism in Design, p.5

Germany, the focus was not a journal but a school of art and design. The Bauhaus provided the nucleus for German Modernism – in the Fine Arts as well as design – between 1919 and 1933...In Paris, several publications, culminating in the journal "L'Esprit Nouveau" (1920-1925), provided a public profile for the Purist movement. (This movement remains significant primarily through the writings and work of Le Corbusier). In the USSR, Constructivism and Suprematism came to the fore in the wake of the Revolution.

These movements held exhibitions, published manifestos and created prototype objects and buildings, with great fervour, between them establishing the terrain of the debate. By 1925, their proselytising had paid dividends, for there was Modernist activity of one kind or another in most Western countries, especially in those where the debate as to the role of design had been most vociferous at the end of the last century. In Belgium, Britain, Sweden and America, for example, a healthy "Pioneer" activity came to rapid maturity, the implications of the new design being seized upon and adapted to local demographic, industrial and political conditions. Ironically, by 1940, there were few traces of the original movements left in Germany or the USSR, but by then they had reached the point of widespread legitimacy. 18

Given the ambitions of the Pioneers, it is surprising that so discernible a style appeared so quickly. Few of their principles actually gave any kind of indication as to how they should appear. By 1930, however, most of them were producing designs which looked remarkably similar. Whether these were indeed authentic reflections of the outlined principles or not, the Modern Movement had, against all the odds, created a consistent style... When compared with the breadth and variance within, say, Art Deco or Art Nouveau circles, or the range of possibilities that come under the heading of Modernism in the Fine Arts, the Modern Movement is marked by its restrictive nature...

Taken collectively, the techniques and materials suggested by the principles could not in themselves have led to the specific 'look' we now identify with the Modern Movement, especially as it existed at the time of the International Style.... The small band of Modernist designers at work during the 1920s were aware of each other via exhibitions and journals and they influenced each other visually. They liked what they made and they associated their crisp, stark, dynamic products with their ideological position. There is little in their theoretical outlook to explain why the buildings and furnishing exhibited at the Seidlungen of Weissenhof (Stuttgart, 1927) or Siemensstadt (Berlin, 1932), given their spatial variance, should be so uniform. Modernist principles thus did not wholly result in the style; rather, the style was a representation of Modernism and therefore of its principles.¹⁹

The rise of National Socialism and the departure of most of the leading architects for Britain and the US or Russia, effectively spelt the end of modernist architectural development in Germany.

¹⁸ Greenhalgh, Modernism in Design, p.6

¹⁹ Greenhalgh, Modernism in Design, p.20

It is not definitively known how much exposure Ancher was able to achieve to these various ideas and influences during his time in Europe from 1930 until 1935, and again in 1939. However, it can be reasonably assumed that he gained a sufficient knowledge of the main facets of Modernism to incorporate it into his architectural work after he returned home and more thoroughly in his residential work during the post WW2 decades.

The Northbourne Avenue Housing Project, for which he was selected in 1959, gave Ancher his first and only chance to develop a large scale housing development based on the Modernism to which he was exposed in Europe. It is necessary, therefore, to gain a background understanding of this work and the principles that underpinned it.

3.2.2 Le Corbusier and Medium Density Housing, 1920s

Sydney Ancher returned from Europe in the mid 1930s as a great admirer of modernist architects, most notably Le Corbusier and Mies van der Rohe. Le Corbusier published a series of monographs throughout this career, each summarising a decade of his work and philosophical development as an architect. The first, covering the two decades 1910 – 1929, was widely read by students of architecture throughout the world. It is highly likely that Ancher was familiar with this edition before he left for Europe or soon after he arrived, and would have been familiar with Le Corbusier's works that were subsequently set out in the second edition, covering the years whilst Ancher was in Europe and therefore had some opportunities to see the completed projects and gain awareness of Le Corbusier's unbuilt projects.

Le Corbusier's early influence was reinforced by the magazine *L'Esprit Nouveau* that he founded in c.1920 and the subsequent book, *Vers une Architecture*, published in 1923. This was translated into English in 1927 as *Towards a New Architecture*:

It became one of the most influential architectural books of the century, presenting a confident call for an architectural language in tune with the machine era that Le Corbusier sensed rising around him. But as well as putting a case for a new architecture, and providing some hints concerning its eventual appearance, Le Corbusier also stressed the role of tradition in providing great examples whose lessons might be transformed to contemporary purposes.²⁰

One of Le Corbusier's (then still known as Charles Edouard Jeanneret) earliest explorations in this field was in 1914, when he and Max Dubois developed a system that they called "Dom-ino". It comprised a two storey rectangular concrete framed building that formed the basis for a rapid reconstruction process of the many villages and houses that had been destroyed in Flanders in the opening phase of the First World War. The house types and rows of connected houses that the architect generated from this system:

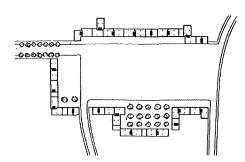


Figure 3.5 Le Corbusier's Maison Dom-ino geometric plan Source: *Le Courbusier*, 1910-1929

²⁰ W. Curtis, Modern Architecture since 1900, p.168

probably reflected Jeanneret's admiration for the unadorned dwellings of the Mediterranean, with their flat roofs and cubic shapes modelled by light. Indeed, the Dom-ino houses were the first of a number of attempts by the architect at founding a modern, industrialised equivalent to the vernacular of the past.²¹



The rigid geometric layouts developed by Le Corbusier in his sketches bear a remarkable similarity to the planning layouts of the Paired Houses, with their re-entrant courts, adopted by Ancher for the Northbourne Avenue Housing Precinct in 1959.

Le Corbusier developed his ideas further and presented the "Maison Citrohan" at the 1922 Salone d'Automme in Paris. He continued to develop his ideas in a number of individual domestic commissions and design sketches over the following years. Unlike in Germany with its large scale public housing programmes of the mid and late 1920s, there was little opportunity in France for the erection of mass housing. It was only in 1926 that he was able to use his ideas to create a housing estate in Pessac, on the outskirts of the French city of Bordeaux. Pessac, "as its mixture unit types would indicate, was a culmination of his incessant attempts in the early 1920s to put his various designs for the standardised dwelling into production."22 This project provided a total of 130 reinforced concrete frame houses for the French industrialist Henri Fruges to provide accommodation for his workers. Among these free standing and detached houses, one of the dominant themes, among some five variations, was the Maison Citrohan prototype.

Le Corbusier did not realise a true version of his "Maison Citrohan" until he was invited by Mies van der Rohe to contribute to the 1927 Stuttgart Weissenhof Seidlung exhibition.

It is not known if Sydney Ancher ever visited Pessac to study the urban combinations developed by Le Corbusier. The scheme was certainly illustrated in Le Corbusier's first monograph. It is known, however, that Ancher visited the Stuttgart Seidlung during his stay in Europe, by which time the collection of remarkable buildings erected for the summer exhibition in 1927 were occupied by tenants. Some of the features of Le Corbusier's houses of this period, most notably the cubist composition, paired arrangements and roof terraces were subsequently incorporated by Ancher in his Northbourne Avenue Housing scheme.

Figure 3.6 Le Corbusier's Maison Dom-ino Source: *Le Courbusier*, 1910-1929

²¹ Curtis, Modern Architecture since 1900, p.85

²² K. Frampton, Modern Architecture: a critical history, p.155

3.2.3 Otto Haesler and Row Housing in Germany, 1923

The emergence of the architectural philosophy known as the "New Objectivity" (*Neue Sachlichkeit*) in the Bauhaus school of design and elsewhere during the 1920s was inextricably linked with the Wiemar Republic's mass housing programme initiated by the stabilisation of the currency in 1923 and in response to the enormous population pressures and slum clearance programmes commenced in the aftermath of World War One.

In 1923, Otto Haesler, recognised as the pioneer of *Zeilenbau* (row) housing completed the Seidlung (Housing Estate) Italienischer Garten at Celle, near Hamburg. The houses were distinctive in their use of flat roofs and polychromatic rendered facades, a formula that was adopted by Ernst May for his first large scale housing developments in Frankfurt in 1925. Throughout his career Haesler concentrated on building good but inexpensive housing for ordinary people. His overriding aim was "light, air and sun for all".

In 1924, in the Seidlung Georgsgarten, his second work in Celle, Haesler developed Theodor Fischer's Alte Heide row housing model of 1919 into a general system, the housing being laid out in rows an optimum distance apart for sun penetration and ventilation.²³

Haesler developed a model in which south or west-facing living rooms open onto communal green space. In Georgsgarten, Frampton notes:

Haeser added short south-facing blocks to the terraces, which ran north-south, thereby creating a series of L-shaped green courts, extending out into adjacent allotments... At Georgsgarten, Haesler also evolved the basis apartment type, of which he was to design many variations throughout his career. His typical apartment, staked on three floors, with staircase access in pairs, consisted of a living/dining room, a small kitchen, a WC, and three to six bedrooms. The replacement of the traditional Wohnkuche by a separate kitchen was a radical departure in mass housing, and had the critical social impact of shifting the household focus towards an austerity version of the bourgeois "salon"... Haesler was to upgrade his typical apartment in the Seidlung Frederich Ebert-Ring at Rathenow, built in 1929, where a separate bathroom was introduced into the standard walk-up unit.²⁴

3.2.4 J J Oud 1918-1933

One of the most influential architects of early Modernist large scale housing was the Dutch architect Jacobus Johannes Oud, known as J J Oud. He was appointed as chief architect of Rotterdam in 1918 at the age of 28 and was deeply involved in the De Stijl artistic movement. Holland had benefitted from its avoidance of conflict during World War One, but still needed to produce new housing for workers at a time when many labourers were coming to the cities.

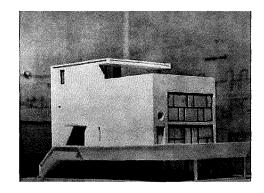


Figure 3.7 Maison Citrohan, 1922 Salone d'Automme Source: *Le Corbusier, 1910-1929*

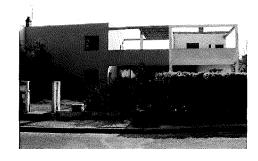
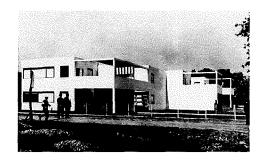


Figure 3.8 Paired house, Le Corbusier



Pessac housing estate (1926), Le Cobusier Source: *Le Corbusier, 1910-1929*

²³ Frampton, Modern Architecture, p.137

²⁴ Frampton, Modern Architecture, p.137

Oud, who aimed to produce socially progressive residential projects, created two well known and important projects in 1924, the Keifhoek Workers' Housing in Rotterdam, and a project in the Hook of Holland. The Rotterdam Housing was notable for the way the two storey blocks of whitewashed houses, with their exquisite detailing, intertwined with their surrounding spaces. At the Hook of Holland he achieved a remarkably expressive formal design of two blocks of identical houses, the ends of which were rounded.

It was felt that in Holland:

Oud usually had the advantage of regularised street patterns and flat terrain which welded well with his style and approach, but there was no guarantee that the supposed universal qualities of his designs would be transferrable to other conditions.²⁵

The test would come when he was invited by Mies van der Rohe to join 16 other European architects in the Stuttgart Weissenhof Siedlung Exhibition held in the summer of 1927.

3.2.5 Weissenhof Siedlung Exhibition, Stuttgard 1927

Sydney Ancher's work at Northbourne Avenue has been attributed by Professor Jennifer Taylor as having been strongly influenced by the Weissenhof Siedlung complex which he visited as part of his Travelling Scholarship in the first half of the 1930s.²⁶ However, the remnant estate was only part of the major exhibition that took place on the outskirts of Stuttgart in the summer of 1927, three years before Ancher arrived in Europe. Unlike many influential but temporary exhibitions in Europe in the 1920s, the Weissenhof Siedlung complex survived and the buildings were tenanted after the exhibition concluded. Even with the destruction from wartime bombing, eleven of the houses have survived into the late 20th century.

Developed under the leadership of Mies van der Rohe and sponsored by the Deutsche Werkbund, the Weissenhof Siedlung Exhibition, held in the summer of 1927, is widely regarded as one of the most influential events in the rise of European Modernism. Mies invited seventeen of the most avant-garde architects from Germany, France, Holland, Belgium and Austria, including Le Corbusier, Walter Gropius, Bruno Taut, Peter Behrens, J J Oud and Mart Stam. Le Corbusier was awarded the two prime sites, facing the city, and by far the largest budget. A total of 60 dwellings were spread amongst the 21 buildings. Nearly all of the participating architects were then under the age of 45, the youngest of them, Mart Stam, was only 28. Only Hans Poeltzig and Peter Behrens were considered the exception as senior statesmen and pioneers of modern movement architecture.



Figure 3.10
Haesler's row housing in the Seidlung
Georgsgarten, 1924
Source: Frampton, *Modern Architecture*

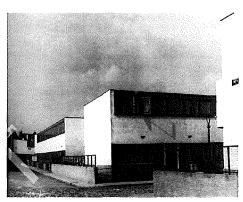


Figure 3.11 JJP Oud, Kielhoek Workers' Housing, Rotterdam, 1925



Figure 3.12 JJP Oud, Rotterdam Housing Estate Source: www.greatbuildings.com

²⁵ Curtis, Modern Architecture since 1900, p.252

²⁶ Architectural Projects Pty Ltd, Northbourne Avenue Housing Group, Canberra: Conservation Management Plan, p.27. See also http://www.canberrahouse.com/2006/11/08/northbourne-housing-group-1959/

Weissenhof Siedlung represented a new type of building exhibition. For the first time fully functional experimental buildings were erected that would later on serve as "regular" leased apartments. At the time of the exhibition they were furnished in accordance with ideas of "Neues Bauen" (Functionalism). In addition, there was an experimental area where different building techniques and materials were shown, complemented by an indoors exhibition with the latest technological devices, furnishings, furniture and household equipment. The work on show included some 60 national and international architects, including Ernst May, Hugo Haring, El Lissitzky, Erich Mendelsohn and Frank Lloyd Wright.

In a contemporary review of the Weissenhof exhibition Wilhelm Lotz observed:

The development seems almost like a living organism; everything is naturally interrelated. Indeed, this seems to us the most important and beneficial aspect of the Stuttgart site: that the exponents of the current architectural revolution are not attached to dogmatic principles, they do not stick mindlessly to slogans, but modestly subordinate their ideas to the demands of human life and needs. Yet they also go further than this, not in formal terms, but in the desire to point the way to a new form of living, which will come to terms with the contemporary forces so often regarded even now as the enemies of all human culture: technology, industry, and rationalization.

The development is bound to become a whetstone for critical opinion. But we should wholeheartedly support the attitudes which have led to the creation of these buildings, for surely no forward-looking human being can doubt that the experiment will bring results of great importance, or that it is an event of great cultural significance.

The exhibition of plans and models should complement the development itself and draw attention to the generation of architects who in every country are standing up openly and sincerely in support of the new architecture. Here one has an overwhelming impression that these developments are not the expression of a style in the old-fashioned sense, based on and embodying a specific formal language, but that they are grounded in the structure of our times, answering to the specific demands of the task in question. And as Mies van der Rohe emphasized in his opening speech, this part of the exhibition shows that the Weissenhof site is not just an example of contemporary fashion in this country but part of a movement which is spreading throughout the world. And we may count ourselves lucky that we are able to examine the designs and plans of this group from all over the world, gathered together here in one place.

Approximately 500,000 visitors came to see the Werkbund Exhibition, and publications worldwide would highlight its ideas. As a result, contacts were made and maintained which in June 1928 led to the foundation of CIAM (Congrès Internationaux d'Architecture)

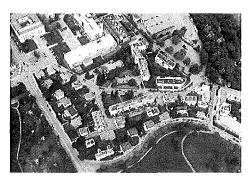


Figure 3.13 Aerial photograph of Weissenhof, 1927



Figure 3.14
Oud's Weissenhof Stuttgart, constructed in 1927



Figure 3.15 JJ Ould's contribution to the Weissenhof Exhibition

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd

3.2.6 CIAM (Congrès Internationaux d'Architecture)

CIAM (International Congresses of Modern Architecture) was an organization founded in Switzerland in 1928 that was dedicated to the advancement of both modernism and internationalism in architecture. It was responsible for a series of events and congresses arranged around the world by the most prominent architects of the time, with its initial membership drawn from across Europe and Russia including Le Corbusier, his cousin Pierre Jeanneret Robert Mallet-Stevens, Walter Gropius, Gerrit Rietveld, El Lissitsky, Moisei Ginzburg, Karl Moser, Ernst May and Mart Stam.

Ultimately CIAM's goal was to disseminate the principles of the "Functional City" and the Modern Movement, focusing on all the main domains of architecture (such as landscape, urbanism, industrial design, and many others). The organization was hugely influential. It was not only engaged in formalizing the architectural principles of the Modern Movement, but also saw architecture as an economic and political tool that could be used to improve the world through the design of buildings and through urban planning.

In the interwar years CIAM met at La Sarras, near Geneva, in 1928, in Frankfurt in 1929 (where they were hosted by Ernst May and discussions centered on ideas of living in minimal dwellings), in Athens in 1933 (which gave rise to the organization's Athens Charter and ideas of the 'Functional City'), and in Paris in 1937. CIAM provided an effective forum for debate amongst Modernist theorists and practitioners although it began to drift away from its central focus in the years following the end of the Second World War, when critiques of Modernism became increasingly attractive to the avant-garde. It was finally disbanded in 1959, following the 1956 meeting in Dubrovnik.²⁷

3.2.7 Berlin Building Exhibition, 1931

Sydney Ancher is cited as having attended this exhibition in Berlin as part of his Travelling Scholarship, and been influenced by it throughout his subsequent domestic architectural work in Australia.²⁸

The International town planning and housing exhibition was held in connection with the German Building Exhibition, in Berlin, between May-August, 1931. The Building Exhibition was directed by Mies van der Rohe and included work by Le Corbusier and Walter Gropius. It was the first major European exhibition that Ancher was able to visit while it was being staged, giving him full access to the entire presentation of ideas. He had only been able to see the remaining buildings from the 1927 Weissenhof Siedlung exhibition, as Le Corbusier's L'Esprit Nouveau pavilion at the 1925 Paris Exhibition had been demolished well before Ancher arrived in England.



Figure 3.16 Le Corbusier at Weissenhof

²⁷ For a discussion on the principles and objectives of CIAM, see E. Mumford, *The CIAM Discourse on Urbanism*, 1926-1960

²⁸ Architectural Projects Pty Ltd, Northbourne Avenue Housing Group: Conservation Management Plan, prepared for Housing ACT, March 2007, p. 21. See also Apperly, Richard E., 'Ancher, Sydney Edward Cambrian (1904–1979)', Australian Dictionary of Biography, National Centre of Biography, Australian National University, http://adb.anu.edu.au/biography/anchersydney-edward-cambrian-9348/text16413.

Sydney Ancher admired the simplicity of the model house designed by Mies van der Rohe. He later credited the project as the first and only truly modern house he saw, and continued to be impressed by it more than any other building in his lifetime. The exhibition house was a single storey building, with glass walls that opened onto surrounding terraces; the modular plan arranged so to link indoor and outside spaces... All of these characteristics later became features of Ancher's houses.²⁹

3.3 Large Scale European Housing, 1920s

In the decade prior to the early 1930s, in the order of one million dwelling units were erected throughout Germany as a response to critical housing shortages. A very large number of these dwellings were in the form of Siedlungen, or sponsored housing estates, with many of these exploring and adopting the new architecture of modernism. One of the major contributors to this enormous building programme was Ernst May, who was responsible for the construction of some 10,000 dwellings in Frankfurt between 1925 and 1930. Major projects were also undertaken in cities such as Beslau, Hamburg, Celle and Berlin.

Martin Filler, in an article published in the *Australian Financial Review* on 18 November 2011, in which he reviewed the exhibition on Ernst May held in Frankfurt in 2011, concluded that in Western and Central Europe publically sponsored housing was the defining architectural form of the Modern Movement. The provision of decent dwellings for all people was a cardinal tenet of the reform movement that arose throughout the industrialised world in the late 19th century when new building materials and construction techniques seemed to put that ideal within the grasp of reality. In the traumatic decades following World War One, these massive schemes aimed at establishing political stability, equality and the nurturing of a productive workforce.

In her well known 1932 survey "Modern Architecture", the influential architectural writer Catherine Bauer estimated that one in ten German families benefitted from the nation-wide initiative. She characterised it as "the most fruitful epoch of modern housing which the world has yet to know".

It is not known if Ancher inspected many of the large scale housing projects that had been built in Germany in the decade or so before Adolf Hitler became German Chancellor in 1933, although his visits to the Weissenhof Siedlung in Stuttgart, the 1931 Berlin Building Exhibition and other travel in Germany, suggest that this may have occurred.

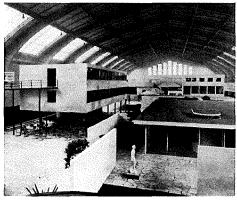


Figure 3.17
The 1931 Berlin Exhibition
Source: www.google.com/



Figure 3.18 1931 Berlin Exhibition Source: www.google.com/

3.3.1 Ernst May in Frankfurt, 1925-1930

Ernst May returned to his native Frankfurt in 1925 charged with the task of implementing the city's major new housing programme. May had already realised a series of small agricultural communities in Silesia in the first half of the 1920s, in which he had reflected the influence of Unwin's ideas that he had absorbed in England as a young student. His new task was on a massive scale. The numerous Seidlungen that May and his associates designed for Frankfurt were loosely based on the Garden City principles, with much attention focussed on the natural setting and the creation of hygienic living.

The so-called New Frankfurt" project spread across the entire city, incorporating small sites within the existing city structure as well as large open tracts on the outskirts, such as in the Nidda Valley to the north west of the city.

The delightful landscape of this site ... offered ideal conditions in which to develop the ideas and aspirations of the "New Building" using large units. It also provided an opportunity to interpret the relationship, so important to May, between architecture, topography, Siedlung and landscaped nature in urban expansion projects as a reconciliation of the opposites "city" and "country", and to implement this in a programmatic way.³⁰

May's early buildings possess their own traditional, apparently handcraft-based aesthetics of materials. Despite May's interest in series production and standardisation, the Siedlungen with their distinctly defined areas, village-green-type spaces, single trees, groups of trees as focal points, views and courtyard-like boundaries, awaken memories of buildings in small rural towns. May avoids radicalism and the machine aesthetic; like Adolf Loos he endeavours to transfer tried and tested constants from the history of urban planning to the modern era. This applies to the first Siedlungen such as Praunheim, Romerstadt, Heimatsiedlungen and Bruchfeldstrasse. Later-in Westhausen, the Tornow-Gelande Siedlung and Mart Stam's Hellerhof Siedlung-the initially cultivated craft and building-shed-like elements components ... have disappeared.³¹

May described the aesthetic principles of his Frankfurt Siedlungen, executed over a total of 26 completed projects, in the following manner:

The external form of the Frankfurt Siedlungen is developed from the situation of the internal structures and dispenses with representative gestures and decorative elements, both old and new. Up to now, every culture has had the courage to develop its own forms of expression. We do not see why our age, which had achieved amazing things in the area of technology should not go its own way in the area of building technology.³²

³⁰ C. Quiring et al, Ernst May, p.56.

³¹ C. Quiring et al., Ernst May: 1886-1970, p.63

³² C. Quiring et al, Ernst May, p.60



Figure 3.19
Frankfurt Siedlung project
Source: Quiring, *Ernst May, 1886-1970*



Although public housing patronage in Berlin worked quite differently than in Frankfurt, it too had its share of remarkable housing schemes. Among the most notable were those of Gropius for the Siemensstadt and by Bruno Taut with Martin Wagner at the Britz-Siedlung.

After his resignation from the Bauhaus at the end of 1927, Gropius became increasingly involved with the problems of housing; so that apart from the extensive low cost schemes that he designed and saw built in the late 1920s in Dessau, Karlsruhe and Berlin, he became theoretically concerned with the improvement of housing standards and the development of housing stock into a classless system for community settlement.³³

Bruno Taut adopted the "New Objectivity" as the most appropriate to the stringent social programme implicit in the new housing scheme.

However, he was far from being a mere 'functionalist' in intention, and sought to imbue the standardised and repetitive forms of his designs with an aura of dignity and with a communal spirit. The Britz plan was centred on a horseshoe-like open space embraced by a strip of housing. From this focus, parallel oblongs were disposed with layers of green space between.³⁴



Romerstadt Siedlung, Frankfurt, 1929 Source: Quiring, *Ernst May*



Figure 3.21 Bornheimer Hang Siedlung, Frankfurt, 1927

Source: Quiring, Ernst May



Figure 3.22 Hohenblick Siedlungen, Frankfurt Source: Quiring, *Ernst May*

³³ Frampton, Modern Architecture, p.140

³⁴ Curtis, Modern Architecture since 1900, p.251

3.3.3 Conclusion

In layout and appearance the Seidlungen were far removed from the free standing family houses of the Garden City with their pitched roofs and rustic overtones. A characteristic layout was a long, low block between three and five storeys high, with access ways and stairs between the paired flats that were placed on each floor. This led to an almost monotonous repetition of standardised modules and constructional elements, which the architects attempted to humanise by judicious attention to proportion, scale, light, shade and detail. The tight budgets allowed for no frills but the resulting asceticism was turned to good use as an expression of co-operative discipline and moral rigour. The planar, white or coloured surfaces were enlivened in any case by the play of shadows from trees and the juxtaposition of lawns and planting.³⁵

3.4 The International Architectural Exhibition, Sydney, 1927

The 1927 International Architectural Exhibition held in Sydney, was an attempt to broaden the horizons of both the public and professionals. The exhibition itself was supplemented by a series of highly popular lectures, in which the new architectural styles were analysed and debated.

It was also an opportunity to announce to participating countries that Australia was 'coming of age' in the field of architecture, and served to demonstrate the cross-pollination of European ideas and influences into the Australian sphere. The countries that submitted exhibits for display were Great Britain, New Zealand, the United States of America, Czecho-Slovakia, India and Germany. Of the Australian states, only New South Wales, Victoria and Tasmania participated. However, it was evident that it provided a forum in which a two-way flow of ideas could be disseminated:

We may learn much from the new method of approach which the German architects seem to make towards the solution of structural problems, and though the majority of the housing schemes are clothed in barrack-like exteriors, there are a few notable exceptions where the handling of the materials, the utilisation of surface texture and a skilful use of colour has resulted in very pleasant and livable dwellings. The value of foliage in these designs has not been overlooked, and the otherwise hard character of the buildings have been relieved by tree-planting.³⁶

Although still a student, Ancher would have been very aware of this exhibition. His then employer, Prevost Synnot & Ruwald, was one of the exhibitors. Among the German work on display were a number of modernist projects including recently completed Siedlungen. His early exposure to these projects may well have given Ancher the desire to follow them up when in Europe several years later.



Figure 3.23 Cover of Hohenblick magazine, Frankfurt, 1927

Source: Quiring, Ernst May

³⁵ Curtis, Modern Architecture since 1900, p.249

^{36 &}quot;International Architectural Exhibition" cited in A. Stephen et al, *Modernism and Australia:* Documents on Art, Design and Architecture 1917-1967, p.246

3.5 Modernist Houses in 1930s England

Sydney Ancher lived and worked in the United Kingdom from 1930 until 1935, as part of his Travelling Scholarship. He worked for some time with the noted modernist Architect Joseph Emberton, and studied the works of many others as modern architecture took hold in Britain. While Emberton was better known for his commercial and institutional buildings, including the Simpsons Department Store in Piccadilly, which would have been in design and construction while Ancher was in England, it is the emergence of domestic modernism in Britain that is of relevance to this analysis.

While modern architecture was reaching its peak in the late 1920s in France, Germany, Holland and Russia, it was exerting only the slightest influence in Scandinavia and Britain. But by the mid 1930s the situation had been almost reversed, and these were among the most active centres of modern experimentation left in Europe. In part, this phenomenon was traceable to the influx of immigrants from countries such as Germany where modern architecture had been repressed; equally it was due to happy coincidences of talent, and to national cultural situations which virtually demanded a rejection of tired forms and an inoculation of new creative energy... In Britain, modern architecture was initially remote from the concerns of the state. It set down roots with some difficulty, encountered strong resistance from traditionalists ad remained somewhat marginal in the larger scheme of society. Even by the end of the 1930s, when a fair body of work had been achieved, it could still be portrayed as a cosmopolitan import from the continent... When charting developments in the 1930s, it is crucial to strike the right balance between original ideas and inherited elements, between stimuli of the moment and longer term echoes in the history of architecture.37

Nicholas Pevsner, the noted art and architectural historian, who moved to England from his native Germany in 1933, prepared a series of essays for the December 1939 edition of *Architectural Review*, in which he sought to ground contemporary British architecture in its international context. The war prevented publication and his essays lay unedited in the Pevsner Archives at the Getty Centre in Los Angeles. One was published in "British Modern – Architecture and design in the 1930s", edited by Susannah Charlton, The Twentieth Century Society:

French influence on contemporary British architecture is almost entirely confined to that of Le Corbusier, Mallet-Stevens and Lurcat, i.e. almost entirely to private houses. For only there can an architect, given appreciative clients, develop so much freedom as is necessary to put into architectural reality such gems of abstract art. A factory, an office building, a store, a school, a hospital and a block of flats too, require as a rule so much more uniformity of general treatment that spatial play for its own sake is out of the question.

In these technically and socially more restricted tasks above all,





Figure 3.24
Group of dwellings, Berlin-Pankow. 1926-27, which was included as part of the 1927 Sydney exhibition

Source: http://www.wbv-neukoelln.de/de/home/wohnanlagen/pankow.html



Figure 3.25
Welwyn Garden City, by Louis De Soissons, which was included as part of the 1927 Sydney exhibition

Source: http://welwyngarden-heritage.org/ garden-city-heritage/welwyn-garden-heritagetrust



Figure 3.26 Hohenzollerndamm, Berlin, 1925-26 Source:

http://www.luise-berlin.de/abbild/lexikon/chawi/w/wohnanlage_auguste_viktoria_strasse_411062.htm

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd the universalism of the new style becomes visible. A very limited number of motifs has proved sufficient to express, and express with a surprising amount of personal variety, what is needed. The resulting general uniformity and individual variation are both equally impressive and gratifying. The foremost country in evolving this style has been Germany in the fourteen years between the last war and the Nazi revolution. Precision and straightforwardness are the principle characteristics of this style. A scientific spirit pervades it. Its consistency, its usefulness, are opposed to Le Corbusier's licence. A purpose is stated, practical requirements are investigated, and the most direct formal expression of these is worked out.³⁸

Unlike most traditional housing in mainland Europe, British towns and cities had many examples of the 'flat roof' that was to become the hallmark of modernism. Hundreds, if not thousands of 18th and 19th century terraced houses were built with their roofs hidden behind tall parapets. In this context, the advent of modernism in England was likely to be less controversial than in Germany or France.

3.5.1 "New Ways", Northampton, 1925

The earliest Modernist house in England is ascribed to the German Architect Peter Behrens. In 1925, Mr Wenman Joseph Bassett-Lowke, a wealthy industrialist, commissioned Behrens to design his house 'New Ways' in Northampton. Behren was regarded as one of the pioneers of European modernism - Mies van der Rohe, Walter Gropius and Le Corbusier had all worked for him in c.1910. he was one of the 'elder statesmen' contributors at the 1927 Weissenhof Siedlung.

Bassett-Lowke was actively interested in modern design, notably becoming a patron of the architect and designer Charles Rennie Mackintosh, who remodelled Basset-Lowke's home at 78 Derngate, Northampton. His close contacts with German toy manufacturers, particularly Gebruder Bing, introduced him to the very advanced state of design in Germany and organisations such as the Deutsche Werkbund. He was quick to join its British equivalent, The Design and Industries Association, founded at the opening of the Great War.

3.5.2 Houses at "Silver End", by Burnet, Tait and Lorne, 1927

The earliest modernist example of a workers' housing estate in England was in 1927 by Thomas Tait and his assistant Frederick McManus of Burnet, Tait & Lorne. They were erected for the window manufacturer Francis Henry Crittall, at Silver End in Essex. It was intended to be a model estate, with strong Garden City equity ideals.

Joseph Emberton, for whom Sydney Ancher worked in the 1930s had been employed by Burnet, Tait and Lorne before starting his own practice.





Figure 3.27 Georgian terrace housing with flat roofs, Kensington

In Silver End, a small community of Modernist dwellings, the first in England, visibly influenced by Ernst May's work in Frankfurt, was designed to show off the generous windows made by the local factory and set appropriately alongside the flat Essex landscape: while in East Tilbury there was a direct import of Central European garden city planning.

By 1932 nearly 500 houses had been built. Half a dozen different architects were deliberately employed in order to avoid uniformity of appearance. Several had worked at Letchworth and Welwyn and most of the Silver End houses are traditional brick structures with pitched roofs (albeit with Crittall windows) owing much in their appearance to the Garden City movement.

One example, the two storey paired houses "joined" by a small beam over the parking areas presented a model adopted in 1959 by Sydney Ancher for one of the Northbourne Avenue Housing types.

At the edge of Silver End the Crittall company constructed three large houses for its managers. This one is known as "Le Chateau", by Thomas Tait, and was perhaps a demonstration of the Company's paternal philosophy with managers and workers living side-by-side without physical, social or psychological barriers.

With these notable exceptions, the most widely adopted initial versions of modern architecture in Britain were derived from the work of the Dutchman Willem Dudock and Robert Mallet-Stevens in France. It was not until 1928 that the white, cubic, concrete forms of Amyas Connell's house for Bernard Ashmole at Amersham that a more vigorous modernism was made manifest.

3.5.3 Joseph Emberton

Joseph Emberton's Royal Corinthian Yacht Club at Burnham-on-Crouch, 1931, provided clear evidence that the new architecture was at least understood for its structural principles. This building was included in Hitchcock and Johnson's influential "The International Style" exhibition held at Museum of Modern Art in New York City in 1932. Sydney Ancher worked for Emberton, among others, during his time in London.

Emberton was arguably the first Englishman to be regarded as a modernist architect. His work during the 1930s was prolific and was regularly published in architectural journals of the time.

3.5.4 Expatriate European Architects

A number of well established European architects settled in Britain in the 1930s or worked there briefly before moving on the United States. They included the Russian Berthold Lubetkin, Erich Mendelsohn, Walter Gropius and Marcel Breuer, who often formed business partnerships with local architects. Gropius for example formed a partnership with Maxwell Fry between 1934 and 1937, while Erich Mendelsohn worked for a time with Serge Chermayeff. Arthur Baldwinson worked for a time in Gropius' office in London.

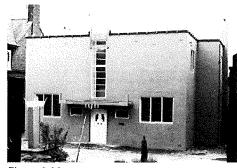


Figure 3.28
'New Ways", Northampton
Source:Courtauld Institute of Art



Figure 3.29 "Silver End" Essex



Figure 3.30
"Silver End", Essex-Paired houses separated by car ports

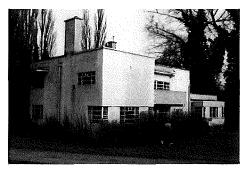


Figure 3.31 "Silver End", Essex- Manager's houses

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd

3.5.5 Wells Coates

The Canadian architect Wells Coates produced an outstanding example of modernism in the 1929 designed "Isokon" Flats in Hampstead for Jack & Molly Pritchard named after their Isokon Laminated Furniture factory. The Pritchards intended that the flats be a collective of units for single professionals, the "minimum flat", with a few larger flats and studios. They originally intended to build a house for themselves on the site, and instead had separate penthouses on the roof for themselves and their children. Their dynamic lifestyle set the tone of the block, which attracted not only young architects and writers but also the refugee architects from Germany and Eastern Europe whom Pritchard was instrumental in bringing to Britain from 1933 onwards.

Isokon Flats are of both architectural and social significance. They were the first major architectural work of Wells Coates, one of the leading activists in the creation of the Modern Movement in Britain in the 1930s, and were the first block of flats to be built in Britain in the fully modern style. It was also the first modern movement building of any kind in an easily accessible location in Britain, and attracted considerable attention. The Lawn Road flats are of great importance as an expression of 1930s' minimal living, at the only time when living in flats was fashionable. They are not only the first modern movement flats in Britain, but the only ones to retain important interiors.³⁹

A number of Australian architects worked for Wells Coates, including Best Overand.

3.5.6 Connell, Ward and Lucas

Large, public commissions were rare for British architects in the 1930s. Many of them had to be content with designing small houses which then acted as experiments for some hoped for future projects. For example the partnership of Connell, Ward and Lucas (two New Zealanders and an Englishman) developed a style of their own on the basis of Dutch, French and Russian precedents, in which solids and voids were juxtaposed in strong contrasts, and reinforced concrete construction was adapted to the unique demands of clients and sites. Their 1937 house at Frognal combined the formality of an urban façade with informality to the rear, where a terrace and full length glazing allowed a link to the garden.

Modern buildings were often regarded with suspicion in Britain. In their design for a small house in the Sussex countryside, Connell, Ward and Lucas were presented by the local council with the option of using either a pitched roof with their intended white walls, or a flat roof but wooden cladding. They chose the second option. Inevitably, however, it must be recognised that the imported foreign architectural ideas were far from the prevalent English notions of "the home".40



Figure 3.32
Joseph Emberton's Frognall Road house, North
West London



Figure 3.33 Isokon Flats, by Wells Coates

³⁹ S. Cantacuzino, Wells Coates, pp.51-63

⁴⁰ Curtis, Modern Architecture since 1900, pp.334-335

Some decades later, Sydney Ancher became famous among the Sydney architectural profession for his celebrated and successful court case against a conservative local council, in defence of a flat roof for the Farley residence in Curl Curl.

3.6 Australian Architects Abroad during the Interwar years

Sydney Ancher was one of the many Australian architects who travelled and worked abroad in the 1930s, many of them in England. Opportunities were presented through travelling scholarships, one of which supported Ancher. Others were motivated by the economic stagnation in Australia to try their luck in the bigger world.

Australia in the early decades of the 20th century was well connected to the intellectual and economic realities of the British Empire, Europe, the United States and to some extent Asia. Awareness in Australia of the developing ideas of modern architecture in Europe and elsewhere was filtered back into local architectural thought through a variety of means, including publications, exhibitions and education. However the most influential stream was based on the personal experiences of many young architects who often spent years working and travelling in the interwar decades. On their return, young architects such as Walter Bunning, Roy Grounds, Geoffrey Mewton, Best Overand and Tom O'Mahony designed striking modernist buildings and worked to integrate modernism into the Australian architectural culture.

Stimulated by the reports of Australian architects returning from international travels, aided by scholarships and lured by the illustrations from the *Architectural Review* amongst other European professional journals, Europe was an important chapter in the education of many Australian modernist architects. In his 1980 volume "Sources of Modernism 1091-1950, D L Johnson notes the importance of the published reports (often in the journal *Architecture*), public addresses and illustrated lectures that were a requirement of the NSW travelling scholarship award recipients. ⁴¹ Sydney Ancher published a series of articles in *Architecture* upon his return in 1935 and again in 1939.

These architects remained in close contact with each other, many while travelling together, working together after their return or through professional discussion groups such as the Modern Architecture Research Society (MARS). Relationships were formed in these decades that flourished after the Second World War.

Arthur Baldwinson, Best Overand and Roy Grounds worked with the well known Australian expatriate modernist architect Raymond McGrath, who was as famous for his writings, including the 1934 publication *Twentieth Century Houses*, as his architectural commissions.

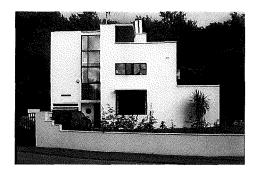


Figure 3.34
House in Highover Park, Amersham by Amyas
Connell was one of a number of early modernist
houses designed by the New Zealand born
architect in this area

⁴¹ M. Bogle, Arthur Baldwinson, PhD Thesis, RMIT, p.12

Overand and others also worked with talents such as Serge Chermayeff and Wells Coates. Baldwinson, who had left Australia in 1932, was subsequently employed with Adams Thompson and Fry at the time when Maxwell Fry was designing the modernist housing scheme for the Gas Light and Coke Company, Kensal House at Ladbroke Grove in London. When Maxwell Fry subsequently formed a partnership with Walter Gropius, Baldwinson joined that office. Fry was closely involved in the Modern Architecture Research Society (MARS), the English equivalent of CIAM. When Baldwinson returned to Australia in 1937 he became one of the founders of the local MARS group, whose members included John Overall and Morton Herman.

Best Overand returned to Melbourne in 1933 and joined the firm that became H Vivian Taylor, Soilleux & Overand. Within a few months he produced one of the earliest modernist blocks of flats in the nation, known as the "Cairo" flats in Fitzroy. This two storey, U shaped block of bachelor flats was planned around a courtyard and featured plate glass windows, built-in furniture, a roof-top terrace and cantilevered concrete balconies, accessways and staircases. Overand described the outcome as a group of flats demonstrating minimum size for maximum comfort, a reference to the thousands of "existenzminimum" public apartments built in Germany in the late 1920s.

One of Ancher's fellow students, Frank Costello, left for Europe in 1928 with the assistance of a NSW Board of Architects Travelling Scholarship. He studied town planning and civic design in London before travelling in Europe, including Holland with Ancher, returning to Australia in 1936. In 1941 he was appointed Brisbane City Architect, where he developed a fine legacy of public buildings.

Henry Pynor worked in the United States with Frank Lloyd Wright before joining the progressive firm of Burnet, Tait & Lorne in 1929, during his second trip overseas. He had worked for Walter Burley Griffin in their Melbourne office before travelling to Canada and the US, where he supervised the construction of Griffin's last work in that country. He was one of a number of Australian architects, including A G Stephenson who participated in the large scale planning of Soviet cities in the early 1930s, when leading Germans such as Ernst May moved east to escape Nazism and develop their modernism ideas under Soviet tutelage. Pynor became a leading architect and educator after his return to Sydney in 1935.

Morton Herman studied architecture at Sydney University under Prof Leslie Wilkinson and based his graduation thesis on Australian Colonial Architecture. His award of a travelling scholarship enabled him to work and travel in Europe for six years, from where he sent back numerous reports between 1931 and 1937 on the latest works of European modernism. His return to Australia saw him combine his love for Colonial architecture with a vigorous campaign for modernism. He was the president of MARS from 1939 until 1941. In 1946, Henry Pynor invited him to teach part time at Sydney Technical College, commencing a long term association with architectural education.

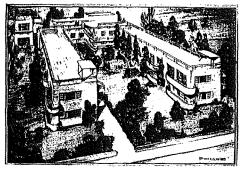


Figure 3.35
Cairo Flats, Fitzroy, by Taylor, Soilleus & Overand
Source: RVIA Journal, July 1936

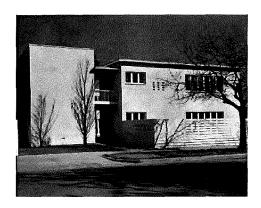


Figure 3.36 Clendon Flats, Armadale, Victoria, designed by Roy Grounds and constructed in 1940 Source: *RVIA Journal*, July 1936

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd The trend continued in the post war years with architects such as Bryce Mortlock and Stuart Murray travelling to Europe soon after graduation. Motlock worked at the London Council. Sydney Ancher took both men into partnership when they returned from England in 1953, forming Ancher Mortlock & Murray. Ken Woolley worked in London in the mid 1950s and eventually joined the same practice in 1964.

As a variation to this trend, the *car importer William Crowle asked Sydney based architect John Brogan to design an apartment complex similar to those he has seen in Germany. Completed in 1936 at Potts Point, "Wyldefel Gardens" brought a "little piece of modern Germany... to the shores of Sydney.*"42 It is not known that Brogan actually visited Europe, but was obviously able to informhimself through printed publications, contact with his colleagues and discussions with his client.

The Australian scene that many returning architects encountered in the mid to late 1930s was very different to that which they had left, as were the ideas that they brought home and discussed with their colleagues. J M Freeland captured the era that emerged from years of professional debate and travel, an era of depression in which very little actual architecture was built:

For five years or more they had talked. At the end of it, hardly having lifted a T square or moved a pencil, they had changed the face of Australian architecture. To the many who had not understood, the new architecture was just another style – a cosmetic like any other. To the some who could follow the essentials, it was the opening of a new window on architecture. To the few who really understood, it was a transcendental way of life that offered hope for all the ills which had racked architecture for nigh on a hundred years... The general ideology that gained acceptance, at first in the profession and then by the public, was a compound of bits and pieces from the main contending schools in Europe and America. It was partly Dudock, partly Wright and partly Le Corbusier. It was constructivist, organic and mechanical, all at the same time. 43

Freeland was scathing of the various streams of Australian architecture of the late 1930s, referring to them as "crassly superficial". He did however note the contribution of a small number of architects, including Gerard McDonell, Sydney Ancher, Walter Bunning in Sydney and Roy Grounds and Geoffrey Mewton in Melbourne who:

carried the torch of honesty and sincerity during the thirties. Most of them were the young Turks and most of them were idealists convinced of the rightness of directness and the importance of climate and the environment. They built houses with open pergolas and verandahs on which the only decoration was the dappled play of tree shadows on cool cream painted brickwork. Low pitched or flat roofs projected protectively several feet beyond bagged walls to cast shade during the hot part of the day... They gave paramount consideration to the convenience and pleasure of the occupants, they were a conscious relationship of areas, they rediscovered

⁴² Goad, Australian Encyclopedia of Architecture, p.108

⁴³ J. Freeland, Architecture in Australia: A History, p.253

the colonial virtues of sunlight and shadow, they strove to fit their environment and to do it all with directness and logical simplicity. They were a small but vitally important spark in Australian architecture before World War II. These aspects were all concepts that which had not been there before and it was to be left to a postwar world to realise how important they were and make them widely used.⁴⁴

In "The Evolution of Modern Architecture," his thesis prepared in fulfilment of the conditions of his travelling scholarship, Sydney Ancher set forth his manifesto. Extracts were published in *Architecture* on 1st December 1939, following his second, short trip back to Europe. Ancher examined in great detail the evolution of society and the contemporary development of structural systems and materials that facilitated dynamic massing and large unbroken expanses of walls, ceilings, floors and windows. The most relevant part of his thesis in relation to the future Northbourne Avenue Housing Precinct is captured in the following quotation:

This thesis has been written with the conviction that a new and vital phase in the development of architecture is being evolved...

The basis of the modern aesthetic is knowledge and system, from which spring all its characteristics of clarity and exactness and its refusal to be content with that which is only approximate or ill-defined...

A building based on the principles of the New Architecture, whether it is an office, a place of entertainment, a school, or a dwelling, can be likened to an organism. Each component part must bear a direct relation to every other part of the whole, and, like a living organism, there must be a harmonious working together of all the separate parts.

With the advent of war, most architects either went into military service or into the production of military infrastructure. Sydney Ancher enlisted in 1940 and was posted to the Middle East for several years. There he was exposed to the cubist simplicity of Mediterranean architecture that had exerted such an important influence on Le Corbusier during his travels in the first decade of the century. After resuming private practice in 1945, Ancher established a strong reputation as a modern architect, producing about ten houses per year until he took Bruce Mortlock and Stuart Murray into partnership in 1952, expanding his work into civic and commercial architecture. However, an intersection of the earlier influences of Le Corbusier's 1920s houses, the spatial arrangement and integrated landscape of the large scale housing estates in Germany, and the cubist clarity of Mediterranean vernacular buildings was to emerge in his designs for the Northbourne Housing Group in the late 1950s.



Figure 3.37 Wyldefel Gardens, 8a Wylde Street, Potts Point Source: Garnet Rose Pty Ltd

3.7 Ancher and Domestic Modernism in Post-War Sydney

William Curtis elegantly summed up the international transmission of Modernism during the middle decades of the 20th century.

Problems of transmission were complicated in the 1930s by the political climate (in Europe) and the emigration of forms to new lands. Moreover, the "masters" were not standing idle and a young architect might be on the point of mastering certain lessons from the Villa Savoye only to be confronted by the Petite Maison de Weekend or the invention of the brise-soleil. With this tendency of a small time lag, it is scarcely surprising that many of the key breakthroughs in the works of Wright, van der Rohe or Le Corbusier in the 1930s should have waited for the post war years to exert their broader influence. 45

In his 2008 PhD thesis, "Arthur Baldwinson: regional modernism in Sydney 1937-1969," Michael Bogle noted that the creative energy generated through the MARS group and by modernist inspired architects in the immediate pre-war years was quickly revived through the highly symbolic award by the NSW Chapter, Royal Australian Institute of Architects, of the 1945 Sulman Medal for Sydney Ancher's Poyntsfeld House, in Maystone Avenue, Killara.

The 1945 award was a signal that modernism continued to be an acceptable, even desirable goal amongst the NSW profession. G H B McDonell's earlier 1940 Sulman Award for a pre-war modernist residence in the suburb of Gordon was now bracketed by Ancher's post-war 1945 award. Contemporary accounts show that Arthur Baldwinson and Sydney Ancher were considered modernism's most accomplished practitioners by the Sydney-based architectural profession in the immediate post-war period. The primary Sydney modernist practitioners working in residential design during the immediate post-war period were Baldwinson, McDonell, Ancher, Walter Bunning, John D Moore, and upon his arrival in Australia in 1948, Harry Seidler...

As partisans of modernism, many of these reforming architects wrote on this subject urging a new approach to residential architecture. The earliest local modernist into print was Sydney Ancher who wrote extensively from his international experiences in Europe during his NSW RAIA scholarship in a series of essays published in "Architecture" beginning in the late 1930s. Former MARS members Moore, released his prescription for residential development "Home Again" in 1944 and Walter Bunning, published his views on planning and architecture, "Homes in the Sun" in 1945.

In many ways the post-war restrictions on building materials and the associated limitation of 100 sq metres on the maximum floor area of new houses reflected the principles behind 1920s "exiztenminimum" from the large scale German housing estates that Ancher and many of the travelling Australians had seen before

the war. When translated through the design brief into very strict budgetary limitations the small scale imposed on average dwelling units were to become as major a design challenge for the late 1950s for the Northbourne Housing Precinct, as they had been for all of the post-war flats erected in Canberra. Ken Woolley has commented that the use of pergolas and carports allowed post war architects, including Ancher, to create much larger living spaces than were otherwise legally permitted.⁴⁶

In their entry for the *Australian Dictionary of Biography* on Sydney Ancher, Richard Apperley and Peter Reynolds summed up this period of Ancher's work.

With Arthur Baldwinson, Robin Boyd, (Sir) Roy Grounds and Harry Seidler, Ancher pioneered modern domestic architecture in Australia. His houses of the late 1940s and 1950s became widely known and demonstrated to others the possibilities of a new approach to the field. Their appeal lay in their subtlety, their suitability for Sydney's temperate climate and their encouragement of a freer life-style for their occupants. Ancher was an unassuming man who firmly rejected the tags of 'intellectual' and 'rationalist'. Many of his planning ideas evolved from a response to simple functional demands, tempered by his penchant for doing things 'his way'. His houses, which have a quality 'rather like a hard-edged painting', demonstrate his conviction that the beauty of the natural environment could be sensitively complemented by the manmade precision of his structures. The rigorous simplicity which characterizes his architecture is tempered by understatement, and by a certain relaxed quality which may be seen as expressing something of the Australian ethos.

3.7.1 Sydney Ancher

Sydney Edward Cambrian Ancher (1904 – 1979) is widely recognised as one of the pioneers of Post-War International Modern domestic architecture in Australia. Others included Sir Roy Grounds, Robin Boyd, Harry Seidler and Arthur Baldwinson. His houses from the late 1940s and 1950s became widely recognised for their ability to demonstrate the possibilities of the new architectural trends. Their appeal lay in their subtlety, climatic suitability and encouragement of a relaxed life style for their occupants. Many of Ancher's planning ideas evolved as a response to simple functional requirements, tempered from his preference to follow his own ideas. Their rigorous simplicity was tempered by understatement which expressed something that connected to the Australian character.

While attending evening classes at Sydney Technical College Ancher was articled to the architect E W S Wakely between 1924 and 1926 before gaining experience with Wunderlich Ltd, Prevost Synnot & Ruwald and Ross & Rowe architects between 1926 and 1930. While at Prevost Synnot & Rowe, Ancher would have certainly been aware of the 1927 International Architectural Exhibition in Sydney, in which his employer was one of the exhibitors.



Figure 3.38 Sydney Ancher, photographed by Max Dupain Source: National Portrait Gallery

46 Ken Woolley, personal comment to Graham Brooks, February 2012

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd That Exhibition included a number of works by emerging European modernist architects, providing Ancher with perhaps his first detailed experience of such developments in architecture. Interestingly, this Exhibition coincided with the famous Wiessenhof Seidlung Exhibition held in the summer of 1927 in Stuttgart.

Ancher qualified as an architect in 1929 and was awarded the Australian medallion and travelling scholarship of the Board of Architects of NSW. He departed for London in 1930 and spent the next five years working with several firms including the noted modernist Joseph Emberton, while travelling widely in England and Europe. Included in his travels was a visit to the Berlin Building Exhibition held during the summer of 1931. Both the 1931 Berlin and 1927 Stuttgart exhibitions had been organised by Mies van der Rohe, who along with Le Corbusier, became major influences on the young architect. Although his official report at the conclusion of his Travelling Scholarship has not been located. Ancher's travels in the UK and Europe in this period would have given him the added opportunity to inspect some of the large scale modernist public housing projects in German cities such as Berlin, Stuttgart and Frankfurt that he appears to have drawn from in his design for the Northbourne Avenue housing project. He may also have inspected some of Le Corbusier's works such as the estate at Pessac in Bordeaux.

Following his return home in January 1936 Ancher worked first for Emil Sodersten before forming a short-lived partnership with Reginald A de T Pevost, where he made a major contribution to the avant-garde house for the Prevost family at Bellevue Hill, completed in 1937. The house is regarded as a rare Australian example of the radical International style and gave an indication of how he was moving towards the kind of architecture he would help to establish in his own country after the war. During these years he also published a number of articles in the architectural press and no doubt remained in contact with other Australian architects who were also returning from Europe.

Ancher and his wife sailed for Europe in January 1939, hoping to settle there again for some period of time. Unfortunately, the approaching war forced a change in plans and they returned home late in the same year. In the following six months Ancher worked with the Commonwealth Government and subsequently with the modernist architect John D Moore.

In June 1940 Ancher enlisted in the Australian Imperial Force and was posted to the Middle East in October 1940 with the 2nd/6th Field Company. His two years in the Middle East would have given Ancher an opportunity to observe the cubist forms and complex urban compositions of the local vernacular architecture. Following his return to Australia in March 1942, Ancher performed engineering and architectural duties within the military establishment before being appointed as a technical officer at the Commonwealth Building Station. Like so many young architects of the time, Sydney Ancher's professional career was placed on hold for the duration of the war, delaying any opportunity to bring his architectural ideas to fruition in any meaningful manner.

After resuming private practice in 1945, Ancher designed about 10 houses per year until the early 1950s, all in his mature, modern style, and completed alterations and additions to numerous hotels. His own home in Killara was awarded the Sulman Award of the Royal Australian Institute of Architects, NSW Chapter, in 1945. He reached notoriety in the architectural profession with his successful defence of a proposed flat roofed house in Curl Curl for W M Farley, the pre-mixed concrete entrepreneur, against the conservative wishes of the local Council. Among the other important houses which followed were the English house at St Ives (1949) and another house for himself in Neutral Bay (1956).

In 1952, Ancher took two of his assistants into partnership to form Ancher Mortlock & Murray, the basis of a major architectural firm that achieved great success in the latter half of the 20th century. The flow of domestic and hotel work continued and from 1960 the firm expanded to take commissions for council chambers, municipal libraries and university buildings. In 1964, Ken Woolley, representing a new generation of young architects joined the firm, expanding the name to Ancher Mortlock, Murray and Woolley, subsequently Ancher Mortlock Woolley and AMW Architects.

In a personal comment to the author, Ken Woolley has confirmed that Sydney Ancher would have been the primary designer of the Northbourne Avenue Housing Precinct. Sydney Ancher and Bryce Mortlock tended to work on their own projects, while Stuart Murray provided technical support in the documentation and construction phases.

Ancher retired in 1966. He was awarded the Royal Australian Institute of Architects Gold Medal in 1975.47

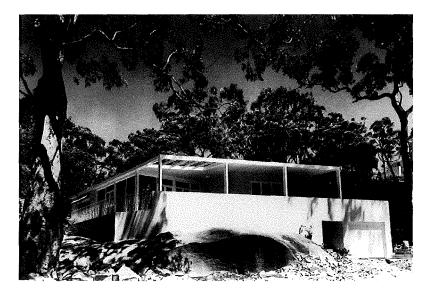


Figure 3.39 Hamill House (1947-1949) Source: *Ken Woolley and Ancher Mortlock & Woolley*

⁴⁷ http://adb.anu.edu.au/biography/ancher-sydney-edward-cambrian-9348

Canberra in the Post War Context, 1945-1959

4.0

4.1 The Evolution of Medium Density Flats in Post-War Canberra

Canberra flat building programmes differed from other Australian cities where the focus had been on housing for the disadvantaged. In Canberra there were a series of deliberate building campaigns to provide housing for the public servants who were being attracted to the new city, or transferred there as part of major departmental relocation programmes. These campaigns involved the construction of a variety of housing types, including hostels, hotels, detached residences and flats. In the decades before the Second World War, the vast majority of new accommodation erected by the Federal Government had comprised free standing houses, hotels and hostels.

Anotable exception had been the complex of staff residences erected in conjunction with the Forrest Fire Station on a block facing Canberra Avenue and bounded by Empire Circuit, Fitzroy Street and Manuka Circle. The complex of eight free standing buildings was erected in 1938 to the design of the Commonwealth Department of Works. It comprised the main fire station, which originally accommodated both the Fire Brigade and the Ambulance Service, and a series of two storey staff residences arranged around the block facing out to the surrounding streets. The seven residences were made up of a two storey house at each of the four street corners, with three two storey paired houses in between. Garages were attached to the residences, acknowledging the increasing reliance on the motor car. The high quality of the architectural design and composition of the residential buildings in particular are recognised in the heritage listing as "a design typical of the Inter-War Functionalist style, inherited from the European modern architecture of the 1920s and 1930s".1 In the context of this examination of the contextual background to the Northbourne Avenue Housing Precinct, these buildings can be considered as a rare pre-war example in the ACT of European modernist architecture being applied to more than a single residence.

The relatively low rate of housing provision for public servants prior to the Second World War came to a virtual stop during the war, resulting in greater pressures for un-met accommodation requirements. In 1948, the government decided to resume the programme of transferring public servants to Canberra, the majority of them from Melbourne. The resultant accommodation shortage was exacerbated by the pending completion of the Administration Building in the mid 1950s, the first major public service office block in post war Canberra.

¹ ACT Heritage Council, Entry to the ACT Heritage Register: 20015 Forrest Fire Station Precinct, Section 35 Blocks 2-10 and 12, Lyneham ACT: ACT Heritage Council, p2.

As a result of these pressures, the government decided to begin a programme of flat construction, looking to a form of accommodation that had not previously found favour in Canberra. This was in addition to the continuing construction of detaching housing throughout the city.

The three initial developments - Griffith Flats, Braddon and Reid Flats, and Ainslie Flats - erected between 1948 and 1952, followed the Garden City principles established by Sulman, with all of the two storey buildings arranged around the edges of long rectangular blocks, facing out to the surrounding streets irrespective of solar orientation, and sharing a central area that was typically used for car parking and clothes drying. The buildings were built of load bearing brick construction with gable or hipped, tiled roofs. The Griffith and Ainslie Flats were finished in face brickwork, the Braddon and Reid Flats were rendered and painted. The essential architectural style was a restrained, symmetrically arranged, Inter-war Georgian, with additional detailing around the entry doors and stairwells.

Subsequent developments in the mid 1950s (Bega-Allawah and Northbourne Flats in Braddon and Turner) were arranged on their sites to create smaller areas of shared open space between adjacent buildings within the overall site. Their placement reveals a conceptual shift towards modernist site planning techniques and the raising of some of the smaller blocks on "pilotis" or columns to allow parking below the buildings. The Bega-Allawah and Currong Flats complexes resulted from a desire for increased residential density in the National Capital. Accordingly they received a strong degree of oversight by the National Capital Planning and Development Committee (NCPDC), particularly given their scale, higher density and prominent location.

The Stuart Flats in Griffith, completed in 1959, continued the overall site planning arrangement of the Bega-Allawah-Currong Flats, although in this context on a steeply sloping site. Relatively low scale buildings are arranged in a linear fashion along the Captain Cook Crescent frontage while much larger blocks are located on the Light Street frontage. The resultant common open space between the buildings was utilised for parking and common areas, but with less clarity, given the steeply sloping site. Their architectural expression remained in the restrained Inter-War Georgian style that was common for most of the Department of Works and Housing designed flats developments of the 1950s.

Gowrie Court in Narrabundah, also completed in 1959, broke away from the "donut" planning model. This was perhaps partly due to the fact that this was the first large scale flats development where the site was not completed surrounded by roadways. The complex comprised six linear, three storey buildings arranged in parallel rows, all oriented for maximum solar penetration. Some architectural influences of the Post-War International style were present, including the very low pitched roof that emphasised the rectangular, cubist form of the blocks. The modernist imagery was also reflected by the crisp, planar form being off-set visually with white-painted cantilevered balconies regularly punctuating the long main facades.

The transition in site planning of major flat developments in important locations can be further appreciated from the design process of the Northbourne Avenue flats in Braddon and Turner. The importance of the site was first recognised when the project was first mooted in 1952. The initial response from the Department of Works was to rely on the additional height of a three storey composition to achieve the required visual impact. Lengthy discussions between the Department of Works and NCDC ensued over the following years, as the search continued for an acceptable outcome that would enhance the status of Northbourne Avenue. The second version had a planning layout with rows of long buildings facing north in a series of repetitive "donut" arrangements, as had been used in Ainslie and Griffith. The final site layout emerged in April 1955, utilising staggered, but totally repetitive groups of buildings with the majority facing north, interspersed with other repetitive blocks aligned on a north south axis. The resultant presentation to Northbourne Avenue was dominated by the narrow ends of three storey blocks set very close to the alignment in a repetitive pattern, and a series of large, shared landscaped open spaces between. Once the site plans and sketch layouts had been agreed, the Department of Works, by then under the leadership of John Overall, approached a number of architects to develop the sketches and prepare contract documentation. Ancher Mortlock & Murray, Hennessy and Hennessy and Foyle Mansfield and MacLurcan were among those approached. Budden, Nangle and Michael were eventually chosen.

The buildings of the Northbourne Flats in Braddon and Turner also exhibited some distinctive aspects of the Post-War International Style, including expressed structural frame, curtain wall, large sheets of glass, overhand for shade, plain smooth wall surfaces, external sun control devices, Corbusian window motif, cantilever, contrasting non-rectangular shape and contrasting texture. The visibility of the pitched roofs, combined with the vertical panels of windows and spandrels separating the face brickwork, weakened the cubiform character that was such an integral component of the Post-War International Modernism style. While there was a great deal of concern about the importance of their Northbourne Avenue location, the Northbourne Flats were not regarded as having achieved a sufficiently high architectural outcome commensurate to their location on such an important thoroughfare.

This was not the case with the civic design outcomes subsequently achieved with the Northbourne Avenue Housing Precinct.²

The Lachlan Court Flats, erected by the NCDC in Barton in 1959, achieved notoriety for their use of "no-fines" concrete in place of the more typical load bearing brickwork for their external walls. The primary objective of this alternative building technology was to overcome post-war shortages in brick supply. The complex of three storey buildings in the prevailing Inter-war Georgian style, comprised 130 small flats and appears to have been laid out around a central courtyard. It was demolished in recent years.

² See Northbourne Housing Precinct, Dickson & Lyneham, Register of Significant Twentieth Century Architecture, R050, Northbourne_Housing_Precinct,_Dickson_and_Lyneham_RSTCA .pdf (1)

An important transition in planning layout towards the Post-War International style came with the Red Hill Flats, completed in 1960, to the design of the Melbourne architects Leith and Bartlett (see Figure 4.40). This scheme was the first to depart from the previous pattern of locating blocks of flats around the perimeter street frontages. At Red Hill the gently sloping topography, urban street layout and site planning resulted in groups of houses and flats arranged symmetrically around three splayed common areas of grassed lawn.

The scale of the planning composition was expanded with paired houses lined along the curving of Cygnet Crescent, on both sides of the main courtyard groups. The architectural character of these buildings made no references to the Post-War International style. The linear three storey flat buildings that enclosed the narrow end of each major court were designed in a conservative style, while the stepped rows of two storey terraced town houses on each of the splayed sides, and those arranged along Cygnet Crescent, looked forward to the future pattern of multiple two storey townhouses with pitched gable roofs and staggered or stepped planning arrangements. This model was to become the dominant form of medium density housing in Canberra for the next several decades.

The Northbourne Avenue Housing Precinct designed by Ancher Mortlock & Murray in 1959 therefore established a significant difference to its predecessors in terms of the use of a variety of building types and group layouts, as much as in its confident adoption of the Post-War International Modernist style of architectural expression.

4.1.1 Forest Fire Station and Staff Residences, 1938

Canberra Avenue, Forrest

Architect: Commonwealth Department of Works



Figure 4.1 Forrest Fire Station grouping Source: googlemaps.com



Figure 4.3 Forrest Fire Station, 1930s Source: National Library of Australia



Figure 4.2 Forrest Fire Station

4.1.2 Griffith Flats, Griffith, 1948

Canberra Avenue and Eyre Street, bounded by full street frontages. Architect: Commonwealth Department of Works and Housing

Two storey complex of eight separate buildings, Griffith Flats, comprised 48 two bedroom flats, completed in 1948. The buildings were arranged around the outer edge of the long rectangular site, with the dwellings facing the surrounding streets. The central "shared" area was developed for car parking, carports, and clothes drying facilities.

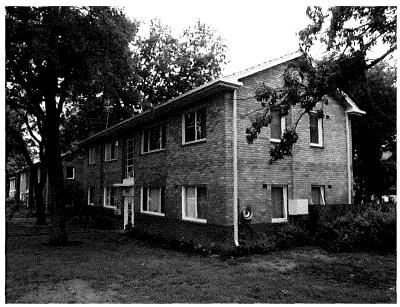


Figure 4.4
Griffith Flats, showing the building articulation with its regular window pattern, the building entry and glassed stairwell

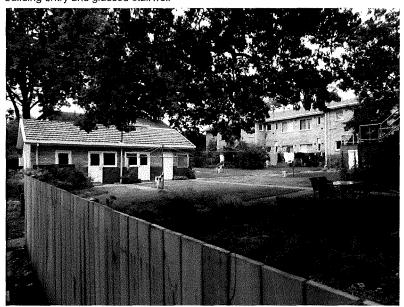


Figure 4.5
Griffith Flats from the rear, showing the laundries and the garden spaces

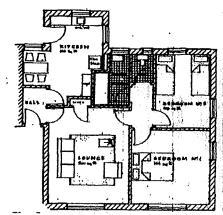


Figure 4.6 Griffith Flats floor plan Source: *Building Lighting Engineering*, March



Figure 4.7 Griffith Flats Source: googlemaps.com

4.1.3 Braddon and Reid Flats, 1951

Two blocks, located either side of Ainslie Avenue, bounded by full street frontages

Architect: Commonwealth Department of Works and Housing

Two storey complex of eight separate buildings, Braddon Flats, comprised 48 two bedroom flats, completed in 1951.

Two storey complex of eight separate buildings, Reid Flats, comprised 20 one bedroom and 28 two bedroom flats, completed in 1951

The buildings were arranged around the outer edge of the long rectangular site, with the dwellings facing the surrounding streets. The central "shared" area was developed for car parking, carports, and clothes drying facilities.



Figure 4.8 Braddon Flats



Figure 4.9 Reid Flats

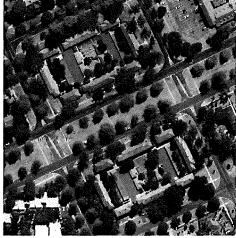


Figure 4.10 Braddon and Reid Flats Source: googlemaps.com

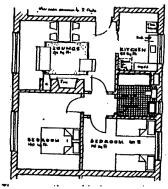


Figure 4.11
Braddon and Reid Flats
Source: *Building Lighting Engineering*, March 1960

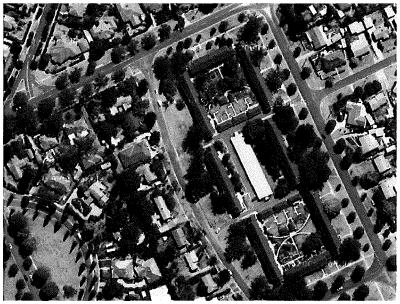
4.1.4 Ainslie Flats, Ainslie, 1952

Hayley and Chisholm Streets, Ainslie, located on a large rectangular block with four street frontages

Architect: Commonwealth Department of Works and Housing

Two storey complex of eight large separate buildings. Stage one comprised 32 one bedroom and 56 two bedroom flats, spread across the two groups of three large buildings facing out to the longer street frontages. The two smaller buildings, facing the shorter street frontages, were completed a short time later.

The buildings were arranged around the outer edge of the long rectangular site, with the dwellings facing the surrounding streets. The central "shared" area was developed for car parking, carports, and clothes drying facilities.





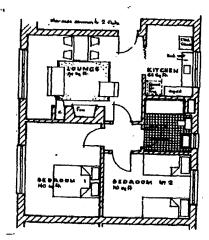


Figure 4.12 Ainslie Flats Source: *Building Lighting Engineering*, March

Figure 4.13 (left) Ainslie Flats Source: googlemaps.com

Figure 4.14
Ainslie Flats, showing the building articulation and the covered entranceway.

4.1.5 Bega - Allawah Flats, Ainslie, 1957

Ballumbir St, Ainslie

Architect: Commonwealth Department of Works, then under the leadership of John Overall, as Chief Government Architect.

This was, at the time, the largest flat development in Canberra's history. The original proposal for an international architectural competition was abandoned.

Three storey complex of eight separate buildings, Allawah Flats, comprised 114 two bedroom flats completed in 1956. Three of the blocks were raised on columns over car parking areas, with some common laundries. The other blocks, located at right angles to form the semi-enclosed courts, were set directly on the ground.

Three storey complex of eight separate buildings, Bega Flats, comprised 114 two bedroom flats completed in 1957. Three of the blocks were raised on columns over car parking areas, with some common laundries. The other blocks, located at right angles to form the semi-enclosed courts, were set directly on the ground.

These flats demonstrate a number of aspects of the Post-War International Style, being a cubiform overall massing, overhangs for shade, plain smooth wall surface, cantilevered balconies and contrasting texture between brick and rendered facades.



Figure 4.15 Bega Flats



Figure 4.16
Allawah Flats, showing the accomodation over the car parking area

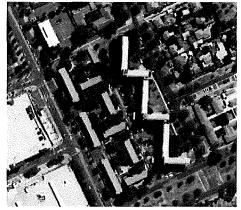


Figure 4.17 Aerial view of Bega-Allawah Flats with adjacent Currong Flats behind Source: googlemaps.com

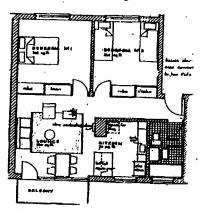


Figure 4.18 Bega-Allawah Flats Source: *Building Lighting Engineering*, March 1960



Figure 4.19 Allawah Flats, 1958 Source: National Library of Australia

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd

4.1.6 Northbourne Flats, Braddon and Turner, 1958

Northbourne Avenue

Architect: Commonwealth Department of Works in association with Budden, Nangle and Michael, Architects, who developed the sketches and contract documents.



Figure 4.20 Aerial view showing Northbourne Flats Source: googlemaps.com



Figure 4.21 Northbourne Flats



Figure 4.22 Northbourne Flats, Braddon and Turner, Source: Reproduced from Wright, *Cornerstone* of the Capital

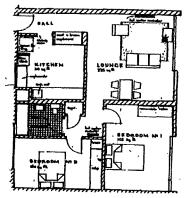


Figure 4.23 Northbourne Flats Source: *Building Lighting Engineering*, March 1960



Figure 4.24 Braddon Flats (1957), photographed by W. Pedersen Source: National Archives of Australia



Figure 4.25 Northbourne Flats grouping, with the central stairwell.



Figure 4.26 Northbourne Flats, viewed from Northbourne Avenue

4.1.7 Currong Flats, Ainslie, 1959

Currong Street, Ainslie

Architect: Commonwealth Department of Works ACT

Eight storey complex of six interconnected buildings, Currong Flats, comprised a total of 184, one bedroom and 28 two bedroom flats, completed in 1959.

These flats demonstrate a number of aspects of the Post-War International Style, being a cubiform overall massing, overhangs for shade, plain smooth wall surface, cantilevered balconies and contrasting texture between brick and rendered facades.



Figure 4.27 Currong Flats, 1960, photographed by W. Pedersen Source: National Library of Australia



Figure 4.28 Currong Flats



Figure 4.29
Aerial view showing Currong, Allawah and Bega Source: Reproduced from Freeman's Bega and Allawah Preliminary Heritage Assessment & Heritage Impact 2009

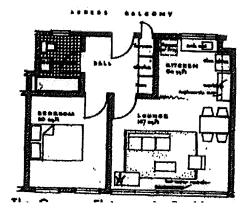


Figure 4.30 Currong Flats Source: *Building Lighting Engineering*, March 1960

4.1.8 Gowrie Court, Narrabundah, 1959

McIntyre Street. The first major block to be built without being on a self contained street block.

Architect: Commonwealth Department of Works

Three storey complex of six three storey buildings, erected in a parallel formation for optimum solar orientation.

These buildings began to show evidence of the Post-war International Modernist style, with very low pitched roofs that accentuated the rectangular, cubic form of the blocks. Another modernist trait was the white painted rendered cantilevered balconies, which formed a regular pattern on the facades.



Figure 4.31 Gowrie Court, Narrabundah



Figure 4.32 Gowrie Court, Narrabundah

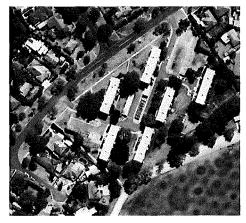


Figure 4.33 Gowrie Court, Narrabundah Source: googlemaps.com

4.1.9 Lachlan Court, Barton, 1959 (Demolished) Brisbane Avenue, Barton.

Developed by the NCDC and the Department of Works ACT to accommodate the influx of public servants.



Figure 4.34 Lachlan Court, 1960 Source: National Archives of Australia



Figure 4.35 Lachlan Court, 1960 Source: National Archives of Australia

4.1.10 Stuart Flats, Griffith, 1959

Captain Cook Crescent and Light Street, Griffith



Figure 4.36
Stuart Flats, showing the articulation of the building



Figure 4.38 Stuart Flats, 1966 Source: National Archives of Australia



Figure 4.37 Stuart Flats

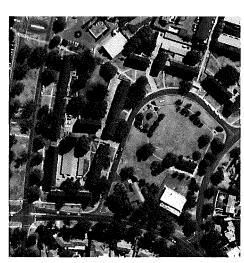


Figure 4.39 Stuart Flats, Griffith Source: googlemaps.com

4.1.11 Red Hill Flats, Red Hill, 1960

Cygnet Crescent, Red Hill Leith and Bartlett in association with Prof Denis Winston



Figure 4.40 Red Hill Housing Source: googlemaps.com



Figure 4.41 Red Hill Flats Source: googlemaps.com

4.2 National Capital Development Commission, 1957

The NCDC files for the Northbourne Housing Project demonstrate clearly the pressures under which the Commission operated to deliver large numbers of new housing at competitive construction costs.

The information contained in this section is largely derived from *Canberra: Yesterday, Today and Tomorrow: A Personal Memoir*, by John Overall. Overall was the first Commissioner of the National Capital Development Commission.

In his Foreword to the book, Gareth Evans, former Senator and Australian Foreign Minister captured the change that came to Canberra in 1958 with the establishment of the National Capital Development Commission:

Until the 1960s, Canberra was a child only its mother would love: "the best lit paddocks in Australia", "this incomplete disjointed muddle of a quasi-city", its planned areas "graveyards where departed spirits await a resurrection of national pride". Australia's capital, if it was ever to realise its intended role as a proud focal point for the nation's sense of identity, was desperately in need of an injection of planning vision, organisational competence and political will.

Happily, these conditions were at last satisfied with the appointment of John Overall in 1958 to head the new National Capital Development Commission. Armed by Prime Minister Menzies with all the powers needed to cut through the muddle of competing bureaucracies which had stifled development thus far, and backstopped by the Prime Minister at crucial steps along the way, Commissioner Overall had all the necessary qualities to succeed: he was a tough and experienced soldier, had distinguished architectural and town planning qualifications and lots of personal charm, and was as formidably cunning a bureaucrat as ever stalked Canberra's corridor.

And succeed he did. Beginning with the building of Lake Burley Griffin – to give the city some shape, coherence and sense of confident momentum – John Overall had, by the time he left the NCDC in 1972 ... overseen the growth of Canberra from a town of 36,000 to a major city of 155,000. All major public service departments had been relocated to it, and there was a clearly defined National Capital area, with the National Library built and plans for a High Court, National Gallery and New Parliament House all well advanced.³

By 1943 Canberra was just two residential areas bisected by the Molonglo River. The provisional Parliament House stood white and serene in the pastures that maps designated as the Parliamentary Triangle.

³ J. Overall, Canberra: Yesterday, Today and Tomorrow: a personal memoir, p.ix.

Much of the bureaucracy remained in Melbourne because development of the National Capital had been virtually brought to a halt by the Depression and then the war. Its population was just 12,000, most of them public servants or their families.

Control of the city was divided between up to four departments with no single authority having the responsibility or power to bring about its creation. There was also outright resistance to the city's development from the states, who feared a loss of influence, and the bureaucrats who had no desire to leave their comfortable surroundings in Sydney or Melbourne to become pioneers in a bush town.⁴

John Overall had graduated as an architect in 1937, from Sydney Technical College, with the award of a Byera Hadley Travelling Scholarship. During his student days, Overall had worked with the newly established office of Stephenson and Turner, where he was exposed to the conservative yet modernist and functional ideas that matured throughout his subsequent career. There he worked with a number of modernist thinkers, including Arthur Baldwinson, Mary Shaw, Tom O'Mahony, Max Collard and of course A G Stephenson. He was involved in the intellectual debates of the Modern Architectural Research Society (MARS).

Overall deferred his travelling scholarship to undertake war service, rising through a distinguished career, to become the Commanding Officer of the 1st Australian Parachute Battalion. Immediately after the war he was served for three years as chief architect of the fledgling South Australian Housing Trust, before travelling to London in 1949 to study town planning under William Holford, amongst others, in fulfilment of his scholarship. After several years in private practice, in 1953 he became Deputy Director and later Director of Architecture of the Commonwealth Department of Works in Melbourne.⁵

The end of the Second World War had done little to lift Canberra's prospects towards becoming a national capital as shortages of staff, manpower and materials frustrated major developments. In 1948 the Government endorsed the transfer of thousands of public servants to Canberra but it did little to make the migration possible. By 1952 there were almost 3,000 outstanding applications for housing and even married public servants were spending years in a hostel before they could bring their families to Canberra.

The impending completion of the Administration Building to provide space for 2,000 public servants, mostly from the Defence Department in Melbourne, added pressure on the Government to do something about providing housing for the soon to be transferred staff and their families.⁶

⁴ Overall, Canberra, p.2

⁵ Goad and Willis, The Encyclopedia of Australian Architecture, p.520

⁶ Overall, Canberra, pp.25-28

The early 1950s witnessed a productive alignment of political, social and economic factors that set the ground for a major development phase in Canberra's development. Stable government, economic growth, increased home ownership, a consumer revolution and a huge increase in both migration and the birth rate coalesced. Crucially, Prime Minster Robert Menzies believed a strong and vibrant capital was needed to bring the six states together and give the country a national focal point.

The 1955 Report of the Senate Select Committee of Inquiry into the development of Canberra recommended the establishment of a single authority to administer and develop the National Capital. The recommendation received the enthusiastic support of the Prime Minister. The Commission was finally formed by legislation passed in October 1957, with John Overall as its first Commissioner. The NCDC was given the formal task "to undertake and carry out the planning, development and construction of the city of Canberra as the National Capital of the Commonwealth".⁷

One of the issues that Overall considered to be among the most important facing the new Commission was:

The unsatisfactory nature of the present housing estate planning which was based on small subdivisions and where the design was determined by one department and the building by another. This had resulted in rows of dwelling units of similar size and shape with inevitable monotony, and no matching community facilities.⁸

To deliver the NCDC's charter, Overall selected a group of highly talented staff including Associate Commissioners Grenfell Rudduck and William Andrews, Chief Town Planner Peter Harrison, Executive Architect John Goldsmith, Secretary Manager Robert Lansdown, Landscape Architect John Grey, and later in the project Gareth Roberts, who became the NCDC's first Director of Architecture and in due course, Richard Clough as Chief Landscape Architect. All of these people made significant contributions to the development of Canberra as the national capital in the post war decades. Professor Ashworth, then of Sydney University School of Architecture, and Professor Denis Winston, also of Sydney University, were special external advisors to the Commission.

The challenge of providing large numbers of dwelling units in a short space of time was enormous. The NCDC had to provide houses in their thousands, yet in the year before it was founded only 306 blocks had been serviced. The majority of major construction firms were not interested in working in Canberra due to the small population, slow growth and its history of stop-start development which had sent many contractors bankrupt.¹⁰

It was also clear that the programme of building blocks of flats in suburbs such as Ainslie, Braddon and Griffith was not adding significantly to the housing stock.¹¹

⁷ Overall, Canberra, p.4

⁸ Overall, Canberra, p.34

⁹ Overall, Canberra, pp.41-46

¹⁰ Overall, Canberra, pp.63-65

¹¹ For an overview of the shortage of housing stock during this period, see Overall's Canberra: Yesterday, Today and Tomorrow, pp.62-67.

A revolutionary approach was adopted that would see complete suburbs kerbed, guttered, sewered, drained and provided with roads, footpaths and lighting before work began on the houses. Large contractors were lured from Sydney and Melbourne to Canberra by offering bulk contracts for several hundred houses at a time, regular progress payments and continuity of work assured, subject to performance and price. This gave considerable advantages due to the economies of scale which were able to be demonstrated to Treasury.

In the initial year of the NCDC, the government was funding around 78% of housing development for public servants transferring from Sydney and Melbourne. As the NCDC wanted to encourage private building it arranged for the building of display homes by contractors, and particularly acknowledged major builders such as AV Jennings, who were the contractors for the Northbourne Avenue Housing project. Within four years, 60% of the building in Canberra was being undertaken by the private sector primarily under contract to the NCDC.

The homes (and flats) provided by the NCDC were relatively modest, because as with all government houses they were subject to strict expenditure standards. They were constructed to a limited range of standard designs and were clad with different materials depending on their availability. They were often designed for ease of extension with units or walls of windows that could readily be removed to allow new work that would enlarge living space. The housing was generally considered to be superior to similar government housing developments in England, the United States or elsewhere in Australia during the same period. On the whole the streetscapes in Canberra did not have the monotony of other government housing because of the variety of designs in each street along with privately built houses to soften the impact. Owners of new houses in Canberra were entitled to a free issue of trees and plants to soften the building site appearance, and greenbelts were planted where possible throughout the city.

The approach taken by John Overall to achieve the successes required by the NCDC were summed up by him as follows:

You have to have total control to succeed and a multi-disciplinary organisation to handle the action.

As with the majority of projects, Overall was to have a major leadership role in the formulation and delivery of the Northbourne Avenue Housing Precinct (see Section 5).

Northbourne Avenue Housing Group, 1959

5.0

5.1 Establishing the Project: Introduction

The information contained in this section has been drawn almost exclusively from the NCDC files lodged at the Australian Archives.¹

Unfortunately, while the written material is excellent and comprehensive, almost no architectural drawings were contained on these files that could be accessed in the time available for the preparation of the CMP.

Nevertheless, these files have established a great deal of useful information about the establishment of the project, the master planning and design work, housing standards and tendering phases. The information discussed below highlights some important issues:

- The Northbourne Avenue Housing Project (1959-1962) appears to have been the second major medium density housing or "Group Homes" project undertaken by the newly formed (1958) National Capital Development Commission. The first appears to have been the Red Hill project.
- Various references and Minutes of Discussions within NCDC held on the Northbourne file demonstrate the Commissioner, John Overall and his senior staff, kept a very tight control over every aspect of the project, as was the case with all of their projects during these early years of the major push to consolidate Canberra as the National Capital. It is evident that the internal NCDC comments reflect a continuous process of rigous design review by senior Commission staff.
- The NCDC did not call a competition for the selection of the architectural firm. As was apparently common practice at the time a short list was drawn up, expressions of interest were invited from selected architectural firms and a final selection made. Two of the most well known modernist architects from Sydney, Ancher Mortlock & Murray and Arthur Baldwinson were the short listed firms. Various references and Minutes of Discussion on the NCDC files for Northbourne confirm an intention on the part of John Overall to develop this project as a demonstration of "modern" architectural and planning principles.
- The original site was further south on Northbourne Avenue. The final site was only identified after the Architects were appointed. It was always envisaged as an important site on the approach to Canberra, one that required a high degree of Civic Design. The combined site straddled the Avenue, providing the important visual impression at the very northern extent of urban development in this precinct at the time.

¹ These principal files are catalogued 59/723, Parts 1-4, National Archives of Australia

- The original design brief to the Architects set the overall scale and mix of accommodation for the project. Initially it was to comprise some 150 dwellings in a mix of one, two and three storey buildings, incorporating flats and attached dwellings. The four storey Bedsitter Flats that had been set aside during the master plan stage, were re-introduced part way through the main construction period, when it was determined that the two and three storey scale of the buildings lining the Avenue needed to project a greater Civic Design presence.
- The NCDC files for the Northbourne project confirm that Ancher was consistently referred to by John Overall as the "architect" throughout the project, with Murray being responsible for the contract administration and delivery of the project during construction.
- Time was an important factor in the entire project, as the demand for housing in Canberra was extremely high, requiring the early delivery of a completed large scale housing project. The Department of Defence was projecting a major move of personnel from Melbourne as part of the first major consolidation of a Commonwealth Department to Canberra. Decision making within the NCDC was extremely rapid to ensure that tight timetables could be achieved.
- Overall construction cost per dwelling unit was an important factor as rents were calculated as a direct outcome of that cost. In order to restrict rents to levels that were reasonable for incoming public servants, it was essential that costs for this project were kept to a minimum and were competitive in relation to comparable medium density housing projects in Canberra at the time. Accordingly, the spatial and accommodation standards adopted for this project were very tightly controlled by the NCDC.
- Continuity of design detailing, fittings, fixtures and construction techniques across all five groups of dwellings achieved not only competitive costing but a cohesive architectural character.
- A strong landscaping programme for the housing precinct was developed by the NCDC to reinforce and complement the buildings. The landscaping was not designed to reinforce the geometric urban structure, but to create amenity for incoming residents and strengthen its civic presence.

5.2 NCDC Selection and Appointment of the Architects

In mid-July 1959, J.B. Redmond, the NCDC Technical Advisor, issued the following memo to the NCDC's Chief Architect:

150 HOUSES, GROUP HOUSING SCHEME, NORTHBOURNE AVENUE

The proposal to build 150 houses in three lots of 50 each was approved by the Commission on 4th July. Construction is to start in May and June 1960.²

² J.B. Redmond, Technical Advisor to Chief Architect, 15 July, 1959, File 59/723 Part 1, National Archives of Australia (NAA).

The following plan illustrates the initial site for the new Northbourne Avenue project. It was located south of Wakefield/Macquarie Avenues but north of Ipima Street.

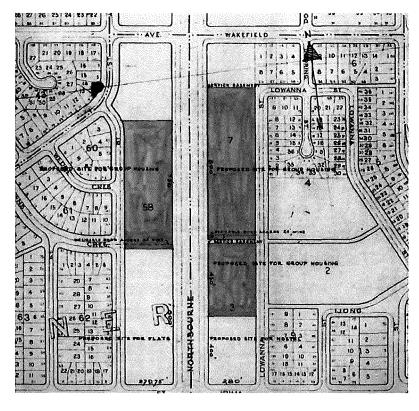


Figure 5.1
Map showing the location initially proposed for the Northbourne development
Source: TP158/59, 59/723, National Archives of Australia

In early August 1959, a memo to the Commissioner from Grenfell Rudduck, Assistant Commissioner, set out the architects who were to be approached for a number of projects, including the Northbourne Housing project. This memo indicates that it was the NCDC's standard methodology to select a short list of architects for specific projects. It also reveals the policy of approaching architects from major Australian cities and to provide special opportunities to young architects where possible:

APPOINTMENT OF ARCHITECTS

Discussions were held with Mr Godfrey and Professor Ashworth about the appointment of architects for the following:

Tariff Board Office Building

In view of the fact that the architect for the building should be selected from Melbourne, it was felt that the choices could be from

Meldrum and Noad Yunken, Freeman Bros, Griffith and Simpson Leith and Bartlett Eggleston, Macdonald and Secoab

I said that we were not likely to wish to load another job on to the last four of these names at this stage so Mr Godfrey suggested that we should add –

H G Alsop, and Tompkins and Shaw A short list would, therefore be – Meldrum and Noad HG Alsop Tompkins and Shaw

Street Furniture

Mr Godfrey and Professor Ashworth felt that this would be a good opportunity to select a Sydney architect. The list proposed was –

Abraham Loder & Dunphy Myer and Wolfendon

Professor Ashworth felt strongly that we should take this advantage of giving a younger person the opportunity of working for us as this job did not involve heavy responsibilities for business management and administration of contracts.

Group Housing Projects

We reviewed the earlier list that had been drawn up for group housing projects. This list included –

Leith and Bartlett
Fulton
Ancher, Mortlock and Murray
Baldwinson and Twibill
Edward, Madigan and Torzillo

It was felt that we should make the selection for the group housing project from Sydney. It was suggested, therefore, that Baldwinson should be a good choice. It was mentioned that he had very little on at the moment.³

At the time, Leith and Bartlett were completing another major housing project in Red Hill.

In a follow-up undated memo, a number of decisions by the Commission were recorded in relation to the current project:

Item 3

... The Commission decided that the aim for next year's housing programme should be for the bulk of the housing contracts to be in groups of 100 or more and for the number of contractors employed on Commission projects to be reduced by half.

As from this date, housing programme management will be the responsibility of the Architectural Division. The Commission wished to record its appreciation of the programme management work undertaken by the Programme Section since July 1958.

³ Memo, Grenfell Ruddick to NCDC Commissioner, 5 August 1959, File 59/723 Part 1, NAA

Item 11 – Appointment of Architects

A - Group Housing Project Northbourne Avenue

Following consideration of a panel of names compiled after consultation with architect members of the Planning committee, it was decided that questionnaires be sent to (a) Ancher, Mortlock and Murray, (b) Baldwinson and Twibel (sic) and (c) Edwards, Madigan and Totsillo [sic].⁴

Invitations to register an interest in the Group Housing Project were then issued to the three architects short listed by the Commission:

Dear Sirs

The Commission is considering appointing a consultant to master plan, design and supervise the construction of a group of 150 houses on Northbourne Avenue, the main entrance to Canberra from the northern end.

The timing for this project is particularly important. The master plan would need to be submitted for approval within one month of the date of engagement, sketches within one month of approval of the master plan, and working drawings necessary to call tenders within three months of approval of the sketch plans. Fees would be in accordance with the Royal Australian Institute of Architects' scale for mass housing.

Your office is one of three being considered for this assignment. If interested, would you please complete the enclosed questionnaire and return it to this office as soon as possible, in any case not later than 14th August.⁵

Each of the three firms responded quickly, expressing their interest in the project. Baldwinson indicated that his staff comprised two principals and three staff. The other two firms each identified three principals and six staff. Interestingly only Edwards, Madigan and Torzillo identified a large scale housing project, 65 flats in Newcastle for the NSW Housing Commission, among the three projects they were asked to nominate as examples of their work. Baldwinson included the Belmont Hotel, for which he was awarded a Sulman Medal in 1957. Ancher Mortlock Murray (AMM) nominated the Applied Sciences Building at UNSW, Faculty of Engineering at Sydney University and the Administration Building for Ku-ring-gai Municipal Council in Sydney. It is interesting that each architect was more concerned to indicate their capacity for large scale projects than to list examples of their small scale residential work.

Unfortunately for Arthur Baldwinson, his then business partner, Geoffrey Twibill resigned at almost the same time as Baldwinson had responded so positively to the invitation.⁶ On 12 August, just two days after his initial response, Baldwinson wrote to the Commission:

⁴ File 59/723, NAA.

⁵ R.B. Lansdown, Secretary and Manager, to Messrs Edwards, Madigan and Torzillo/ Ancher Mortlock & Murray/ Baldwinson and Twibill, 5 August 1959, File 59/723, Part 1, NAA

⁶ See M. Bogle, "Arthur Baldwinson: Regional Modernism in Sydney 1937-1969, PhD Thesis, School of Architecture, RMIT, 2011

Since our letter of 10th August to you, we have received confirmation of matters which will affect our partnership, and we feel that we should advise you of the forthcoming new arrangement.

Some time ago Messrs Buchan, Laird & Buchan Pty Ltd, Architects and Engineers, of Melbourne, approached us with a view to incorporating our firm in theirs.

The outcome of our negotiations is that:

- a. Mr Baldwinson has indicated his preference to practice independently and on his own account.
- b. Mr Twibill has accepted appointment with Buchan, Laird and Buchan Pty Ltd.

Consequently, although we will not be accepting new commissions under Baldwinson & Twibill partnership, either of us would be prepared to undertake this work, Baldwinson on his own account and Twibill on behalf of Buchan, Laird and Buchan.⁷

Simultaneously with the question of the architect, the Commission staff were considering the choice of the site and the budgetary implications of the project. It was apparent that from the Chief Financial Officer's perspective, the costs were a significant factor in the decision-making process:

Housing Group - Northbourne Avenue

The following points might be noted:

- 1. Attached to the brief is a statement of standards to be used for housing in Canberra. This could be taken to be the general standard to be adopted by the Commission but if this is the case then the Commission might consider it as such.
- 2. If it is a general standard, and in any case, it would seem that it would be desirable for the Commission to have a comparison of the features on the standard proposed with the existing standard at present observed by the Department of Works. I understand that the standard is based on that approved by the Commission for the Red Hill Project.
- 3. Particular points could be noted, (including) the floor area of a three bedroom house will be about 10.5 squares (c105 sq metres) or a little less than the Works three bedroom house; there are no wardrobes for the bedrooms; corridors may be expensive.
- 4. The experience of the Commission is that the two storey house is dearer than single storey and it can be questioned whether the houses will be obtained for (the budget of) 4,400 pounds. It would seem that some assessment of what might be expected should be sought from the Architect's Division.

⁷ A. Baldwinson to R.E. Lansdown, Secretary & Manager, National Capital Development Commission, 12 August 1959, File 59/723 Part 1, NAA

5. The Housing Programme schedules three groups of 50 houses to be let to start construction, two in May and one in June 1960. This involves a problem of timing in relation to demands on the Department of Works, Housing Design staff and to a possible home sales scheme, points which I have brought up in another note.⁸

The issue of funds was then under consideration by Mr Goldsmith, Executive Architect; a handwritten memo summarised the results of the Coordination Committee that had met to review the Northbourne Avenue Group Housing. He drew attention to several matters:

- 1. Cost the average cost of 4,400 pounds per unit is considered too low for a project of this importance. I have determined a cost of 4,800 pounds as more appropriate.
- 2. Site the CTP [Chief Town Planner] has proposed another site which requires approval.
- 3. Target the target for master plan will be set at one month from engagement of the architects.9

Interestingly, Mr Goldsmith maintained his preference for Edwards, Madigan and Torzillo to be the appointed architects, primarily as they had expertise in the larger scale of the project and the type of work involved.

At the same time a summary of the Commission decisions noted:

Item 14 - Group Housing Northbourne Avenue

Messrs Andrews and Rudduck are to inspect the proposed site and Mr Rudduck is to review the question of the engagement of the Architects recommended for the project. The inclusion of two bedroom flats is to be clarified and the total responsibility of the architect is to be stated in the brief.

In a Minute Paper dated 19 August 1959, the Commission staff, including Professor Ashworth, discussed the implications of Baldwinson's change of practice and the final selection of the preferred architect. The Commission was concerned that Baldwinson would not be able to deliver a project of this scale, given his reduced professional organisation. Prof. Ashworth retained his confidence in Baldwinson, stating he could easily develop the organisation required. His argument did not prevail. The Memo concluded:

In these circumstances I feel that we could consider Ancher Mortlock and Murray which was the first Sydney firm nominated by Professor Ashworth and Mr Godfrey, and as an alternative Edwards, Madigan and Torzillo who have been recommended by the Acting chief Architect and are supported by Professor Ashworth.

⁸ Minute Paper, N. Caffin, Chief Finance Officer, 13 August 1959, File 59/723 Part 1, NAA 9 Memo, J. Goldsmith, Chief Architect, re: Co-ordination Committe, Northbourne Avenue Group Housing, 17 August 1959, File 59/723 Part 1, NAA

Of these two firms, there is no doubt that Ancher, Mortlock and Murray have a better reputation in housing than Edwards, Madigan and Torzillo and some other job might be more suitable for Edwards than this housing project. I would suggest, therefore, that we should approach Ancher provided we can satisfy ourselves, after discussion with him, that we can meet the requirements for time.¹⁰

The decision was made quickly. Mr Lansdown, Secretary and Manager of the Commission wrote to Ancher, Mortlock and Murray on 20th August confirming their selection for the project:

This letter will confirm your engagement for the above project, as advised by the commission on 19th August.

Enclosed are copies of our Guidance Notes for Architectural consultants, the Design Brief, and three copies of the agreement covering this assignment. Would you please sign all three copies and return to the Commission for completion.

The Design Brief gives you complete responsibility for design, documentation and supervision of construction. It should be noted however that approval of the Commission is necessary at master planning stage before sketches are prepared, and again to sketches before working drawings and contract documents proceed.

It is suggested that arrangements could be made with the Commissioner tomorrow to come to Canberra to finalise details of this assignment.¹¹

Despite the decision to award the consultancy to Ancher, Mortlock and Murray, the question of costs had not been fully resolved. An undated note recorded further decisions by the Commission.

It was also noted that there has been some possible confusion on the cost limit included in the brief and that it may be necessary to reconsider the cost aspect on receipt of proposals from the Architect. The provision of two bedroom units may also be excessive and the EA is to check with the TA the requirements of two bedroom houses as distinct from flats. Subject to possible amendments in consultation with the Architect at a later stage, as outlined above, the brief is approved. The fees payable for this project are to be those of the mass housing scale plus an allowance for master planning.

The Commissioner had brief discussions with the Architect on Friday 21st August and requests that any qualification on the cost limit be conveyed to the Architect in the early stages. The Commissioner also requires that he is consulted before committal of the fee scale to be applied.¹²

^{10 24}A, File 59/723 Part 1, NAA

¹¹ R.B. Lansdown, Secretary & Manager, NCDC, to Messrs. Ancher, Mortlock & Murray, re: Housing Group, Canberra, 20 August 1959, File 59/723 Part 1, NAA.

¹² Memo, n.d., File 59/723, NAA

Consideration of the fee scale to be paid to the architects was further discussed in late August 1959. A hand written note outlines the matters being reviewed:

- 1. The argument raised by Mr Caffin would be relevant to a mass housing group.
- 2. The particular group does not belong wholly to the category because:
- We are using a proportion of flats and terrace houses.
- The group, being situated on the main approach road to the City, is a very important one, and a great deal of time in master planning with stress on Civic Design, is required.
- For mass housing projects, the subdivisions are normally provided to the architects, likewise engineering services would be covered. In this case the architects are required to design the subdivisions and engineering services.¹³

As a result of this analysis, the architects were offered a fee equating to the RAIA mass housing fee scale for the houses and terraces, and 6% for the flats.¹⁴ The Purchase Order for the project was issued to Ancher Mortlock & Murray on 2 September 1959.¹⁵

5.3 The Design Brief

The Design Brief for the Housing Project – Northbourne Avenue issued to Ancher, Mortlock & Murray Architects upon their appointment was as follows:

1 Requirement

- a) Preparation of a master plan, sketch plans and contract document for the development of the site of a Group Housing Scheme. The site is an important one bordering the main entrance into Canberra from Melbourne and Sydney.
- b) The construction programme will be for 150 units.
- c) The units are to be in groups of approximately 50 units depending on site planning.
- d) Submission with the master plan of preliminary sketch plans for the individual units proposed.
- e) Submission of written report describing the scheme including estimates of cost for the total scheme; each group of 50; the individual units; recommendations of materials proposed to be used. Due regard is to be given to materials other than a local brick.

¹³ Northbourne Avenue Group Housing Fees, n.d., 59/723 Part 1, NAA

¹⁴ See the NCDC's Agreement for Engagement of Professional Services with Architects, Ancher, Mortlock Woolley, Northbourne Accounts, file #6008

¹⁵ Order for Goods, Services and Projects: National Capital Development Commission, 2 September 1959, File 59/723 Part 1, NAA

- f) Contract documents
- 2 <u>Time Schedule</u>
- a) Master plan to be submitted by 22nd September 1959
- b) Sketch plans of units and site planning within one month of approval of master plan
- c) Contract documents to be submitted within three months of approval to the sketch plans

3 Cost

The limit of cost is to be £660,000 for 150 units and must include for site works, garages or car ports, paths and driveways, fencing, external lighting, engineering services, site levelling and the provision of top soil.

4 <u>Site</u>

The project is to extend over two sites flanking Northbourne Avenue, one of approximately 5 acres (Turner part Sec 58) and the other approximately 8 acres (Braddon part Sections 7 and 3).

5 Accommodation

The group is to provide for a variety of accommodation as indicated on the following table

Single houses of two storeys Pairs in two storeys Terraces in two storeys Flats of two and three storeys	1 bed 20 20	2 bed 20 50 20	3 bed 15	4 bed 5	
Total Accommodation	20	40	85	5	

With the Commission's approval, the proportion may be varied if necessary to make the most effective use of the site. Other types may be submitted for approval by the Commission.

6 <u>Landscaping</u>

The design is to indicate landscaping and carparking for both groups. The extent of landscaping will be the levelling and grading with loam ready for lawn sowing and tree planting by others.

7 <u>Design Standards</u>

The attached standards are to be used as a guide to the planning of the individual units.

8 Procedures

The preparation of design and documentation at all stages shall be carried out in collaboration with the Commission.

All questions arising from the briefing shall be referred to the Commission's Superintending Architect, Mr S Beckett. 16

The range of building types and numbers of bedrooms specified in the Brief is a clear statement that there was to be a mixture of housing types across the site, designed in response to the site conditions.

Included in the brief provided to the architects were the NCDC "Standards for housing in Canberra (including flat and group development)." They set the target standards for many aspects of new houses and were carefully formulated by the Commission to ensure that the final cost of each new housing unit was kept to budget and was related to the anticipated rental that could be achieved in the prevailing market. The concept of housing standards was familiar to all of the public housing agencies in Australia during the post war decades.

The NCDC Housing Standards included instructions for room sizes (related to the number of bedrooms and the type of dwelling), fittings and fixtures in kitchens, bathrooms, WC and laundry, heating, linen cupboards, electric light and power, hot water, floor finishes, insulation, porches, window sizes and fly screens, car ports, construction materials and colour schemes. Under the term "generally" the Standards concluded:

The planning of rooms, as corridor rooms should be avoided. Kitchens to have close access to the "front" door. It should not be necessary to pass through one room to obtain access to another except in the case of a combined Living/Dining room and I Bed/Living room flats.

¹⁶ National Capital Development Commission Housing Project - Northbourne Avenue: the Design Brief, folio 39A, File 59/723 Part 1, NAA

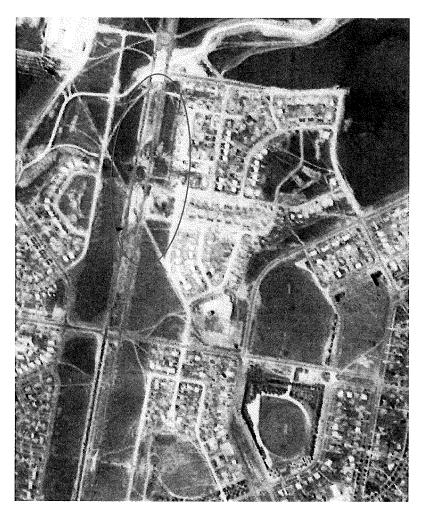


Figure 5.1
Aerial photograph showing the area that became the final site selection in 1959 and the generally undeveloped nature of the northern end of Northbourne Avenue at this time

Source: NSW Land and Property Information

5.4 Master Planning

It is clear from the following commentary that the development of a large housing scheme on such a constrained site posed many challenges for the Architects and the Commission alike.

Ancher Mortlock & Murray were required to submit their master planning ideas by 22 September 1959.¹⁷ The Minutes of a Commission meeting held on 7th October 1959 recorded:

<u>Item 1 – Group Housing Scheme – Northbourne Avenue</u>

For discussion on this item Messrs. Harrison, Goldsmith, Beckett and Brewer were present – also Messrs. Ancher and Murray (Architects)

The Commission discussed the preliminary layout submitted by the Architects for the proposed group housing scheme in Northbourne

¹⁷ The NCDC's Order for Goods, Services and Projects for 2/9/59 specifies Project A 731/733 - Design and Supervise the construction of 150 Houses on Northbourne Avenue; and Preparation of Design for submission to the Commission for approval. Ancher Mortlock Woolley, Accounts files, #6008

Avenue. The main objections seen in the scheme submitted were that there were no single housing units and the doubtful suitability of the three storey row houses from a tenancy perspective.

It was generally agreed that the Civic design character of the layout was satisfactory but that the area should cater for a variety of tenant requirements including some single units. It was agreed that the EA should obtain from the Housing Section of the Department of the Interior views on the tenancy targets of three storey house development. Consideration was also given to proceeding with the development in two phases with first phase relating to the southern half of the layout. It was also decided that a number of single units be incorporated instead of the duplex houses. The Architect was asked to take these views into consideration and submit further proposals for the Commission's consideration.¹⁸

The Commission's Executive Architect, Mr Goldsmith, met with Sydney Ancher in Sydney on 20th October. As a result Mr Ancher was asked to come to Canberra on 28th October, and:

Submit two alternative preliminary proposals for the whole group, together with a preliminary estimate of cost.¹⁹

Sydney Ancher and Mr Morris²⁰ from AMM presented revised planning concepts to a meeting of Commission officers, including the Commissioner, on 3 November. The Minute Paper of that date captured the discussion:

The following points arising from this morning's discussion require clarification and further study by the Architects:

- 1. The long façade of the three storey flat block this might be broken in some way.
- 2. Two storey pairs to west of Northbourne Avenue do not provide sufficient visual impact. If length is increased the architectural effect resulting from travelling along the Avenue would be satisfied. This could be achieved by adding further two storey pairs in the area traversed by the (stormwater) drains; or
- 3. Interest and scale could be achieved by designing now for dominant buildings possibly in the form of point blocks for future construction. These could either be hostels or flats.
- 4. The number of units to be accommodated could be increased considerably by the point blocks, but in any case can be increased by low building development in the vacant areas. The possibility of transposition of the tourist camp could well be investigated.

¹⁸ NCDC Minutes of Commission Meetings held on 7th and 8th October, 1959, File 59/723 Part 1, NAA

¹⁹ R. Lansdown, Secretary and Manager, to Messrs Ancher, Mortlock & Murray, 28 October 1959, File 59/723 Part 1, NAA

²⁰ The NCDC Minutes specify that Ancher and Morris were the consultants. However, this may be an typographical error, with 'Murray' likely meant instead of 'Morris'. A.H. Higgins, Minute Paper, 5 November 1959, File 59/723, Part 1, NAA.

5. The question of flat roofs should be studied by elevations and/or models.

To satisfy the Commission it is now apparent that considerable study must be undertaken by the Architects. This should include numerous elevational and perspective sketches and a block model say 50 feet or 100 feet to the inch.

It is desired that the Commission consider these points and give the Architects a clear directive to proceed on the above basis.²¹

A further Minute Paper, dated 5 November 1959, confirmed the Commission's instructions to the Architects:

That the Commission reaffirms its limit of 25 to 30 three storey terraced units.

That consideration might be given to the breaking of the long façade of the three storey flat blocks.

That an additional group of two storey pairs be added to the western side of Northbourne Avenue in the area at present traversed by drains.

That the architect study the possibility of increasing the number of units by the addition of point block or blocks. This might be achieved by the transposition of the tourist camp.²²

It is apparent from the references to the "tourist camp" that the land eventually occupied by the ACT Tourist Information Centre had already been identified at this early stage and was perhaps located at the northern end of the eastern precinct. It is now set in the centre of the eastern precinct following a later decision to develop the most northern area of both sides of the Avenue with four storey "point blocks" of bedsitter units, thus achieving the required civic design presence.

Stuart Murray wrote back to the NCDC on 9 November enclosing two copies of the preliminary Master Plan, for which they sought approval. The architect's letter noted that sketch plans and preliminary costs for individual units were in preparation and that the model would be produced once a contour plan had been received.

The Architects were subsequently requested to discuss the emerging master plan with Professor Denis Winston, Department of Town and Country Planning at the University of Sydney. Professor Winston was a consultant to the NCDC on town planning matters. His name had not been mentioned in the minutes of any of the master plan review meetings held over the previous few months. His review, contained in a letter to Mr Overall dated 19 November, was less than flattering:

²¹ J. Goldsmith, Executive Architect, to the Commissioner, 3 November 1959, File 59/723 part 1, NAA

Minute Paper re: Northbourne Avenue-Group Housing, A.H. Higgins, 5 November 1959, File 59/723 Part 1, NAA

Housing Group Northbourne Avenue, Canberra, Project A731/733

The Architects for the above project ... were asked to consult with me regarding the general development of the scheme. I have just had a very full discussion with them about their latest plans and I feel that I should put my views formally before you:

- 1. I think that the Architects have done as well as is humanly possible considering the nature of their brief and the limitations of the sites on either side of Northbourne Avenue. I doubt whether a much better layout could be arrived at and I like the suggestions for the architectural treatment of the buildings so far as they have gone.
- 2. In spite of the above I do not think that the scheme will turn out to be really successful because the Architects have been asked to make appropriate frontages for one of the main avenues of Canberra out of a series of one, two and three storey dwellings. I do not think that this is possible.
- 3. In addition to this basic difficulty I believe that the efforts to get the required accommodation on the narrow and awkward sites has led to a serious overcrowding of the buildings which will make it impossible to achieve a reasonable level of privacy, will lead to much congestion with parked cars etc and will make it difficult if not impossible to screen satisfactorily such things as drying areas, especially in cases there these are looked down upon from the first and second storey windows.
- 4. I am full of sympathy with the ideas of giving people smaller yard and garden areas in some cases but this location seems the worst possible for this particular experiment. It seems quite wrong for example that, while in Canberra generally there is such lavish use of land and open spaces, here on the major approach road to the city, with its increasing traffic, small houses should be set back only 15 feet from the 200 foot wide avenue. In some cases kitchens and bathrooms will look on to the highway and I cannot see how the necessary vent pipes, opaque glass, plastic curtains etc could ever form an appropriate entrance to Canberra, no matter how skilful the architect. There will not even be sufficient space for a really effective screen of trees.

I appreciate of course the many inherited problems that make the proper development of this area extremely difficult for you. I feel more however that development on the lines proposed will lead to justifiable criticism. I think it is also a serious matter that such criticism might very well prejudice further development of these highly desirable cul-de-sac and minimum plot schemes in other more appropriate locations.²³

²³ D. Winston to Commissioner J.W. Overall, National Capital Development Commission, 19 November 1959, File 59/723 Part 1, NAA

A hand written note from Executive Architect J. Goldsmith, dated 25th November, expressed concerns about Professor Winston's comments:

Professor Winston's comments ... are a little belated. The Consultants and Consultant Planner should have worked together to avoid these comments prior to any submissions to the Commission.

The points mentioned by Professor Winston are valid.

This job has run a disappointing course in so far as "thinking" and production of sketch plans are concerned, two months time has been lost without a firm proposal being produced.

It is doubtful if the target date will now be achieved.24

In response to Professor Winston's comments, the Executive Architect, Mr Goldsmith, called on the architect's office at the beginning of December. His file note indicated that:

We discussed development of the scheme and I explained to Mr Ancher the bones of Professor Winston's comments. He will endeavour to amend his planning to accommodate the valid factors.

He is preparing a model (100 feet to the inch) of the area. I also made him aware of the (stormwater) drains crossing the site.

Next Submission – Mr Ancher will be in a position to make his next submission probably by the end of next week. He will confirm on Monday 4/12. The submission will be the formal one and will cover master planning, house types, construction, materials and estimates.²⁵

That same week, the Commissioner had written a Minute Paper addressed to the Executive Architect, summarising his discussions with Professor Winston:

Mentioned to Professor Winston that the Commission had decided it was necessary to proceed with the Northbourne Avenue proposal and that we recognised some of the comments made by him to be valid.

It was agreed that he would discuss any points he had with the architects, with a view to incorporation in their proposal as far as possible. I did indicate that we would be prepared to consider suggestions for any loosening up of the scheme, provided the general programme was adhered to.

Subsequently spoke to Mr Murray from Mr Ancher's office and confirmed the early discussions held by Mr Goldsmith and Mr Ancher.²⁶

²⁴ Memo re Housing Group - Northbourne Avenue, J. Goldsmith, 25 November 1959, File 59/723 Part 1, NAA

²⁵ File note, J. Goldsmith, 1 December 1959, File 59/723 Part 1, NAA

²⁶ Minute Paper, J. Overall re Discussion with Professor Winston in Sydney 26.11.59 a)

The formal Master Planning Report for the Northbourne Avenue Housing project was submitted to the NCDC by Ancher Mortlock & Murray on 21st December 1959. The full description provided by the architects is contained in Chapter 6; extracts of the document is provided as follows:

Site Planning

Owing to the restrictive nature of the site, both in physical dimensions and traffic circulation, the usual standards for allotment areas in the Australian Capital Territory have been departed from, but the usual distances from main and secondary roads for building alignments have been maintained.

Internal service roads have a width of 24 feet and parking bays for visitor parking have been provided for Pair Houses, Maisonettes and Courtyard Houses (groups of 3).

In the grouping of the various housing types and the general arrangement within these groups, two main aims have been achieved, viz. to maintain an ordered and unified presentation along Northbourne Avenue with buildings of urban scale and character, and to provide as far as possible on a narrow site the maximum of dwellings with good orientation (97 housing units have the Living Room and at least one bedroom facing north.)

Housing Standards

Generally, requirements of the NSW Housing Commission and current ACT Housing projects have been used as a guide in planning. However, more emphasis has been placed on sizes of living areas to achieve maximum useable living space in the majority of houses which, in this project, are three bedroom family units. Finishes, internal and external, are of a higher standard than the NSW Housing Commission, and a list of additional amenities and fittings are included in our Quantity Surveyor's Summary as well as in our general description.

Car Ports

Car ports have been provided in the ratio of one per housing unit; in the Pairs and Maisonettes they are part of the house complex, and in the Flats and Courtyard Houses they are as described in the general report.

Generally

Planning in all cases emphasises the size of the useable living areas without the use of unnecessary passages. Colour schemes internally and externally will be carefully considered and submitted for approval.

The master planning proposal achieved the following accommodation	7
mix:	

_	1 _	1_
_	-	TC

Three storey 2 bedroom	24
Three storey 1 bedroom	24

Pair Houses

Two storey 3 bedroom	47
----------------------	----

Maisonettes (Row Houses)

Three storey	/ 3 bedro	oom	30

Courtyard Houses

Single Storey 3 bedroom

Total Dwelling Units 14327

Not included in this mix were the "point blocks" at the northern end of the precinct that had been under active consideration only a month earlier. The reason for this deletion has not been gleaned from the documentation.

18

Time was obviously of the essence, as the Commission reviewed the master planning submission on the following day. On 24th December they were able to write to the Architects confirming the following decisions in respect of the proposal:

- 1. The site planning and house designs were approved in principle.
- 2. The cost estimates are to be reviewed to ensure that the tender prices do not exceed 650,000 pounds, exclusive of engineering services. This may result in some planning amendments especially in room sizes. In doing so the standard of external finish should not be reduced.
- 3. Provision is to be made in the contract documents for alternatives covering a range of items to be priced which could be included in or excluded from the tender prices in the event of unsatisfactory prices being received.
- 4. Consideration is to be given to the use of alternative heating other than by slow combustion stoves in the flats. This could be radiant floor heating or such like.
- 5. Working drawings are to proceed forthwith with tender readiness required by end of APRIL 1960.

The Commission is very pleased with the proposals and would like to congratulate you in achieving the atmosphere and character required for the Northbourne Avenue approach to Canberra.²⁸

²⁷ S. Ancher to R. Lansdown, 21 December 1959, File 59/723 Part 1, NAA

²⁸ R. Lansdown to S. Ancher, 24 December 1959, File 59/723 Part 1, NAA

The Architects wrote to the Commission on 20 January 1960 advising of the renewed cost estimate, prepared by Chas. A Harding & Son, Quantity Surveyors. The overall estimate remained at £650,000, however, the QS advised of recent and forthcoming wage and other rises that could be expected to add some 9% to the cost estimate by the time that tenders were returned in several months.²⁹ When he reviewed these cost estimates, which had been achieved by a slight reduction in housing areas to bring down the original estimate of £658,000, the Executive Architect confirmed his support for the scheme given the need for "scale and civic design" for the group. He recommended that approval be given for the tender documents to proceed.

Discussions continued within the Commission and with the Architects for some time about options to reduce the areas of the dwelling units and therefore the cost estimates for the project. This would bring the project more closely into line with the achieved average cost per unit for other projects in Canberra.

5.5 Design Development

The preparation work for the overall project gathered pace in the new year. On 22 January 1960, the Commission wrote to the Department of the Interior advising them of the new subdivision layout that had been developed for the Northbourne Avenue Group Housing project:

The Commission has approved a scheme for the development of part of Section 50, Lyneham and part of Section 51 Lyneham, north to the storm channel reservation.

The block subdivision in Section 50 Lyneham, shown on your C.S.506 has been affected as follows:

- 1. Blocks 1, 2 and parts of 3, 4 are eliminated.
- 2. Depth of Blocks 3 10 inclusive is reduced to 104 feet.
- 3. Blocks 3 and 10 become corner sites, with new roadways (for gazettal) east of De Burgh Street with cut offs to corners at rear.
- 4. Blocks 3 10 (eight blocks) are re-subdivided ... two and blocks each 75 feet frontage, five internal blocks, each 70 feet frontage.

These amendments are shown on the attached copy of C.S. 586.

The principle of the pathway leading from the southern end of Owen Street, Lyneham to Northbourne is maintained in modified form.

²⁹ Chas A Harding & Son, Quantity Surveyors to Messrs Ancher, Mortlock & Murray, 20 January 1960, File 59/723 Part 1, NAA

Would you please carry out such computation and drawing as required and, in due course, forward two copies for our records please.

The proposed service loop road is not shown complete on the attached drawing. Further information will be forwarded at the earliest opportunity.³⁰

By early March 1960 the ACT Chief Fire Officer had reviewed the detailed floor plans and construction materials and recommended some modifications to fire doors to meet the required fire safety standards. These were communicated to the Architects who wrote back to the Commission on 14th March 1960 enclosing sketches showing the requested changes.

- 1. The semi-purpose laundries to the three storey flats are isolated from the common stairway by 6 inch (overall) solid masonry walls and metal clad fire doors of 1 hour rating.
- 2. The stairways of the three storey flats are isolated on the ground and first floors by metal clad fire doors of 1 hour rating to the entry of the flats.³¹

In late February the National Council of Women had reported on their inspection of architectural drawings for two current Commission projects, Red Hill and Northbourne Avenue. They were unable to comment on the completed Lachlan Court bachelor flats without getting some opinions form the existing occupants. This was apparently a standard external review process for the Commission, with the Council offering very clear comments on the practicalities of the internal arrangements, access for delivery of furniture, lighting and ventilation, privacy and acoustic separation.

For Red Hill, by then in construction, the Council commented that "the idea seems a good one. The workmanship also has been commended by those who have seen the project".

However their comments on the drawings for the Northbourne Avenue project were more critical and it eventually transpired that the design for the single storey Courtyard Houses was abandoned in favour of what became known as the Garden Houses.

In general, this project is also an interesting one. However, we took strong objection to the plan of the courtyard housing which appear to have been planned without regard to either Canberra's climate or the need for reducing sound as much as possible.

Complaints were raised about the proposal to double stack parking for the flats, a proposal that would have required the tenant of the second car to be found when the first car was to be driven away. Replanning and roofs for the car ports were suggested to improve the conditions on frosty mornings. Other concerns were expressed about the adequacy of parking spaces for the bachelor flats, windows on the upper floors to be designed so that they can be cleaned by the tenants, the apparent lack of privacy of the toilet when viewed from the living room and the type of cupboards to be provided.³²

³⁰ R. Lansdown to The Secretary, Department of the Interior, 22 January 1960, File 59/723 Part 1, NAA

³¹ R. Lansdown to Stuart Murray, 11 March 1960, File 59/723 Part 1, NAA

³² Olive Birmingham, National Council of Women, to A Foskett, National Capital Develop-

The comments were referred to the Architects for review. Stuart Murray responded on 6th April, partly with a defence of the scheme and partly to reassure the Commission that the detailed design issues could be overcome or that the concerns were misplaced:

Courtyard Houses:

- 1. The main Bedroom and Living Room face north, an ideal orientation in Canberra for sun during winter.
- 2. The need for reducing sound is no more than in Terrace Houses (Maisonettes), about which no such point is raised. The construction of these houses, i.e., concrete floor slabs and 11" cavity dividing walls, render them immune to transmitted noise, unlike timber frame floors.
- 3. The Living Room plan shape is an interesting pne, which gives the house a strong character of family living; it is more capable of being furnished for multi-purpose activities of dining, reading, conversation etc.
- 12 General opinons of "inconvenience", "unattractiveness", and "poor use of space" are answerable only by our opinion, which is, naturally, the opposite.
- 13 The concept of planning three houses off a common court is one of intimate character which is achieved in this case; individual planning is restricted to fullest possible use of minimum area within the physical boundaries of the site.
- 14. The Living Room has a full glass wall to the north (including the door) measuring 8'0" high by 9'0" wide. We consider this "good front windows."
- 15. There are three covered carports and three open "off-street" parking places to each three courtyard houses.

Generally:

- 16. The absence of separate hallways for space reasons in all housing units. Space reasons are financial ones; it is estimated that a hallway measuring 40 square feet costs £125.0.0 per housing unit.
- 17. There are linen and broom cupboards in all housing units. Vacuum cleaners are usually kept with brooms...Coats are generally kept in wardrobes.
- 18. The floors to the flats are sound proofed by a composition underlay. Division walls are cavity construction to reduce impact noises.
- 19. There is one covered carport to each housing unit; as much visitor parking as possible has been provided, but it will be agreed that physical restrictions (.e.g., traffic circulation and limited site are real problems in this case.

20. The greater percentage of upper floor windows not otherwise accessible from balconies are awning friction-stay windows, cleanable from the inside. Two pairs of large windows in the Maisonettes (Second Floor) and Pairs (First Floor) are difficult but possible to clean from the inside.

21. W.C./s are all concealed from Living Rooms, even while the door is open.³³

This debate about the Courtyard Houses remained an ongoing issue within the NCDC. In a Minute Paper dated 1st June 1960 to Mr Rudduck, the Secretary Mr Lansdown commented as follows:

You suggested that I might take a look at the comments put forward by the National Council of Women on the courtyard houses in Northbourne Avenue and on Ancher's reply.

I am not aware of whether the design of these courtyard houses is typical of what one might expect in terrace houses or in flats, the point being that if this design is characteristic of such units, then presumably Ancher could not be criticised over something that has been forced on him.

Leaving this point aside and viewing the courtyard design as a matter of livability, I myself do not feel that the standard of convenience and livability will be of the optimum.

He then reviewed the detailed issues that had been under discussion and concluded:

I am of course unacquainted with the design of like units elsewhere and for that reason, would not press these views too far. I have tried to set aside the fact that I would not like particularly to live in such surroundings myself and express therefore my views as being essentially that the internal arrangements of these units appear to be ill balanced.

It is possible that we are going to tender on the Northbourne housing project on Saturday of this week or in any case, immediately after. It may be that the only changes that could be made will be of a minor nature by way of variations unless we are going to pull these units out.

A hand written note addressed to the Commissioner on the bottom of this Minute added weight to the argument and noted that the lay opinion of the Courtyard houses was unfavourable.

You will note also that siting is peculiar to say the least – If you live in the centre unit of the row you have to walk through someone else's front garden and past someone else's drying yard and back gate before you can enter your home.³⁴

³³ Stuart Murray to R.Lansdown, 6 April 1960. Ancher Mortlock Woolley project files, Northbourne Avenue Correspondence, #6008.

³⁴ Minute Paper, R. Lansdown to Commissioner Rudduck, 1 June 1960, File 59/723 Part 1, NAA

The ACT Constituent Council of the National Council of Women had been formed in 1939, joining a network of Councils that commenced in NSW in 1896. The current website describes their aim:

The National Council of Women is a non-sectarian, non-party political, volunteer organization. With the assistance of its national network of Standing Committees in the areas of Communication, General Well Being, Social Issues, Status of Women and Sustainable Development, NCWA works to address issues of concern to all women and their families and acts as a voice or agent of communication on an Australia wide basis.³⁵

It is clear that the NCDC regarded the Council as a very useful contributor to the successful provision of large scale housing in Canberra.

It is apparent that the project went to tender in early June 1960, with tenders opened on 28 June. Nevertheless the concerns about the courtyard houses was such that Overall called on the Sydney office of the Architects on 7 June 1960 to review the detailed design work. Closer coordination was requested with the Parks and Gardens Section, who would be responsible for the landscaping design. In addition to issues such as electricity supply, heating, parking for visitors, privacy concerns with the full length windows, the emerging phenomenon of television, and washing facilities, there was considerable discussion about the criticisms of the Courtyard Houses that had been raised by the National Council of Women (NCW).

Part of this process included a review of new housing projects by the NCW particularly with regard to the "liveability" of public housing. On 24th August, the NCDC wrote to the architects referring them to comments and advice provided by the National Council of Woman on the Red Hill project:

As you are probably aware a contract covering the erection of 132 dwelling units at Red Hill is nearing completion.

Considerable planning both by the Consultants (Leith and Bartlett) and the Commission went into the project which was recently inspected by the National Council of Women.

As a result of this inspection that Council commended those concerned on the careful planning which went into the work but nevertheless made various criticisms as shown in the attached schedule forwarded for your information.³⁶

It was finally agreed that the existing design be used as the basis for tendering but that the Architects develop further options for this particular component of the project. Two such options were submitted on 20 June. Yet another option was submitted a week later.

³⁵ www.ncwa.org.au

³⁶ R. Lansdown to Messrs Ancher, Mortlock & Murray, 24 August 1960, File 59/723 Part 1, NAA

A summary of the Northbourne project was provided in a report ultimately intended for use as a brochure:

The Site

In two parts on either side of Northbourne Avenue, A.C.T. On the west is 6.54 acres in Lyneham...bounded by the stormwater channel to the North and De Burgh Street to the West. On the east is 3.93 acresin Dickson... bounded by Dooring Street to the east. Both sites have a depression of 1'0" about centre with a rise of 2'0" to the south. Main service lines bisect both parts from West to East. There are no trees.

2. Requirements

To plan approximately 150 housing units of 3 vedrooms (average) on two long narrow sites with access only from the rear secondary roads, retaining an ordered presentation to Northbourne Avenue with service yards etc. concealed from the main road. Orientation to the North is limited by site depth.

3. Site Planning

Owing to these various site characteristics, the road pattern forms a system of loop roads and cul-de-sacs, with off-street parking and carports. The ratio of allotment size to road frontage is reduced considerably thus conserving land for housing use, but usual plantation strips are maintained.

Building blocks are composed and arranged in various housing types to form a pleasing formal pattern to Northbourne Avenue with rear entries. This arrangement forms "commons" and other open spaces between buildings so that alternating patterns of building and planted recesses occur as one passes through the scheme.

As far as possible the site layout and individual house planning succeeds in orienting a maximum number of housing units to the North (106 Living Rooms receive the North sun).

4. Urban Character

Housing types consist of one, two and three-storey buildings combined in units of urban scale, creating a unified character on either side of Northbourne Avenue. To achieve harmony between each building type, roof forms, external finish and window types are identical. Individual building types vary in form.

Generally an order of town scale and character is achieved.37

5.6 Tendering and Re-Tendering

Tenders from six construction firms were opened on 28 June 1960. The lowest was from A.V.Jennings (Canberra) Pty Ltd in the sum of £680,225, and the highest, £774,861, from K.S. Clementson (NSW) Ltd. Immediately after the submission of their tender, A. V. Jennings wrote to the Architects pointing out an omission in their tender of £26,607,38 which raised their tender to £706,832. The

Neil Caffin, Acting Secretary and Manager, N.D.C.C, to Ancher, Mortlock & Murray, 6 July
 1960. Ancher Mortlock and Woolley project files, Northbourne Avenue Correcpondence, #6008.
 P. Armstrong, Manager, A.V. Jennings Construction Co (Canberra) Pty Ltd., to the Commissioner, National Capital Development Commission, 1 July 1960, File 59/723 Part 1, NAA

Architects advised the Commission that mistakes of this nature were not uncommon in Sydney when large projects were priced by builders under tight time frames. Even with the amended price, A.V. Jennings was still well below the second lowest tender.

Unfortunately, at £706,832, the tendered price was well above the estimated price of £675,000.

On 8th July the Architects wrote to the Commission stating that that for ethical reasons they were unable to recommend a specific tender and suggested that the two lowest tenders be invited to re-price the project, or alternatively all tenderers be invited to reprice on an amended scheme which would include the amended courtyard house plans.³⁹ On 18th July, the Architects submitted a list of some 10 amendments, including a change in the brick selection, cheaper damp proof coursing material, door hinges, fire doors and roofing material, prefabricated cupboards and substitution of the specified heating systems. They also submitted a further amendment to the Courtyard houses, reducing the floor area of each house by around 100 sq feet. These amendments were estimated to save around £46,000.⁴⁰ Two days later they wrote to the Commission offering to delete the Courtyard houses altogether, affecting a significant saving of £139,500 for that component.⁴¹

The Commission gave rapid consideration to the Architects' suggestion, writing back on 22 July to confirm its decisions of the previous day. They were reluctant to accept some of the savings, in particular the suggestion to replace the proposed capped timber fences with ordinary paling fences. These were considered inappropriate for the "important siting of the project". With regard to the 18 Courtyard houses, the Commission decided that they would be omitted, asking the Architects to prepare a scheme for 18 to 20 Garden Flats, possibly of two storeys. Butter paper sketches were to be submitted within one week, however, the revised scheme must be brought in at or below the original estimated price of £675,000.42

The Architects were asked to arrange for retendering by inviting all the previous tenderers. The Commission made it clear that the aim was to let a contract no later than the end of September 1960.

On 1st August 1960 the Architects submitted revised plans to the Commission for the Garden Flats. In their letter they described the two alternatives proposed:

Scheme A is a single storey development of detached Garden Flats with separate entries, gardens, carports and laundries, but with common drying areas. The walls of adjoining units are used as fences to each private garden. There are twelve 2 bedroom units of 850 sq feet and six I bedroom units of 650 sq feet.

³⁹ S. Ancher to the Acting Secretary and Manager, National Capital Development Commission, 8 July 1960, File 59/723 Part 1, NAA

⁴⁰ Stuart Murray to the Acting Secretary and Manager, National Capital Development Commission, 18 July 1960, File 59/723 Part 1, NAA

⁴¹ Stuart Murray, Ancher, Mortlock & Murray, to the Acting Secretary-Manager, National Capital Development Commission, 20 July 1060, File 59/723 Part 1, NAA

⁴² N. Caffin, Acting Secretary and Manager National Capital Development Commission to Stuart Murray, 22 July 1960, File 59/723 Part 1, NAA

Scheme B is a two storey development of six blocks of attached Studio Flats (own laundries) with common carports and drying areas. There are twelve 2 bedroom units of 850 sq feet and six I bedroom units of 650 sq feet.

Both schemes are equal in area and have been estimated to cost 69,000 pounds each.

Upon indication of which scheme the Commission prefers, more detailed sketches will be submitted.⁴³

Two days later, the Commission confirmed their preference for the 18 single storey garden flats, and requested that the amended contract documents be ready for tender by 1st September, with the aim to let a contract by the end of September.⁴⁴

Even as the Architects moved into the final stages of contract documentation, they were reminded of the importance of achieving a high quality outcome.

Revised tenders were opened on 26th September 1960. They ranged from £684,783 to £705,216, with A.V. Jennings again coming in as the lowest tenderer. The new tender was still above the updated estimate of £675,000, but only by 1.45%. The Architects advised the Commission to accept this tender, given the climate of steadily rising wages across the building industry.⁴⁵ Ancher Mortlock and Murray, having amended their fees in accordance with the revised tender, sent a summary to the NCDC:

1 Schedule of Professional Fees based on Scale of Fees for Mass Housing (R.A.I.A.)

F

Part A Block 1 at 6%

Block 2-4 at 5%

5.25% of £152, 418.0.0

Part B Block 1 at 6%

Block 2-4 at 5%

Block 5-10 at 4%

Block 11-12 at 3.5%

4.44% of £249,895.0.0

Part C Block 1 at 6%

Block 2-4 at 5%

Block 5 at 4%

5% of £160,963.0.0

Part D (i)

Block 1 at 6%

Block 2-4 at 5%

DIOUN 2-7 at 070

Block 5-6 at 4% 4.83%

(ii)

Block 1 at 6%

Block 2-4 at 5%

Block 5-10 at 4%

Block 11-12 at 3.5%

at 3.5% 4.33%⁴⁶

⁴³ Stuart Murray to J. Goldsmith, 1 August 1960, File 59/723 Part 1, NAA

⁴⁴ N. Caffin to S. Murray, 3 August 1960, File 59/723 Part 1, NAA

⁴⁵ S. Murray to R. Lansdown, 26 September 1960, File 59/723 Part 1, NAA

⁴⁶ Stuart Murray to R.B. Lansdown, 4 October 1960, Ancher Mortlock Woolley, Northbourne Accounts, file #6008

The contract for the construction of the Northbourne Housing project was let by the NCDC to A.V. Jennings on 27th September 1960.⁴⁷ The actual contract was signed on 28th October.⁴⁸

5.7 Construction - Materials and Colour Selection

Even before the contract was signed, minor improvements were under consideration. The Commission wrote to the Canberra Electricity Supply authorities on 18 October advising that it would prefer that the electricity services to the development should be by means of an underground cable system.⁴⁹

In early November, the Architects commenced what would become a lengthy assessment process to identify the preferred form of heating for the dwelling units.⁵⁰ On another front, it was suggested that a centralised TV system be installed to avoid a plethora of "unsightly" television aerials.

A Clerk of Works, employed by the Commission, commenced work on 5 November 1960.⁵¹

In early December the Commission finalised an issue that had been raised during the design work some months earlier. Now that there was a Builder to advise on costing, the choice between a concrete weather-porch roof, supported on brick piers, and a timber entry porch roof for the paired houses was determined. The concrete roof option was selected, despite it being slightly more expensive.⁵²

By 21st December the Architects were able to report solid progress on the construction of footings for the Paired Houses, while excavation was well underway for the remaining three groups of houses. Stuart Murray, who had been closely involved with Sydney Ancher throughout the design and documentation process, now took control of the construction phase. His monthly reports to the Commission indicated that he visited the site each week, often spending two or three days for each visit. Nevertheless, it is very clear from the correspondence file that John Overall and the Commission generally regarded Sydney Ancher as the Partner in Charge of the project on behalf of Ancher Mortlock & Murray.

The early months were spent obtaining and assessing tenders from a wide variety of subcontractors and suppliers. As was the normal practice Prime Cost Sums for these items had been allowed in the tender price. In general the final prices for the various supply items tended to be a little below the original allowances, building up a <u>small reserve</u> of surplus funds for subsequent use on the project.

- Order for Goods, Services and Projects, 27 September 1960, File 59/723 Part 1, NAA
 R. Lansdown to Messrs Ancher, Mortlock & Murray, 31 October 1960, File 59/723 Part 1,
- 49 R. Lansdown to The Secretary, Canberra Electricity Supply, 18 October 1960, File 59/723 Part 1, NAA
- 50 File Note, Ancher, Mortlock & Murray: Analysis of Heating Costs, 7 November 1960, File 59/723 Part 1, NAA
- 51 R. Lansdown to Messrs Ancher, Mortlock & Murray, 14 November 1960, File 59/723 Part 1, NAA
- 52 Stuart Murray to R. Lansdown, 5 December 1960, File 59/723 Part 2, NAA
- 53 File Note, Ancher, Mortlock & Murray: Work Progress Report, 21 December 1960, File 59/723 Part 2, NAA

On 31st January 1961 the Architects wrote to the Commission advising that due to a shortage of local common bricks they were considering substituting Monier cement bricks for the walls of the carports, garden walls, garden depot and the single storey Garden Flats, subject to testing of their structural strength and their compatibility for the application of the Tyrolean render external finish.⁵⁴

The tender for the Tyrolean Render finish was so competitive that the opportunity was taken to apply a render base coat in addition to the specified three coat system. This decision was well founded, given the lack of subsequent deterioration of the Tyrolean render across the majority of the buildings.

By early April 1961, Mr Murray was able to report good progress on the structure and slabs of the Paired Houses, the Flats and the Maisonettes, with the Garden Flats lagging somewhat behind. Discussions on site between the Architect, Builder and Sub Contractor resulted in decisions about the internal render finishes:

It was finally decided to sponge finish internal walls after sanding with extra fine sand, and samples of steel trowel finish (laundries) were set up and approved. All ceilings will be finished with white Tyrolean (white cement and marble dust) to sample. External Tyrolean render colour samples have been approved.

Mr Murray also recorded the two roof construction techniques, expressing confidence that each will provide the required heat transference performance.

The Garden Flats were timber frame as follows:

Metal deck roofing Aluminium foil sisal 4 inch Air Space between rafters 2 inch glass fibre or "Slagwool" insulation 3/8th inch fibrous plaster ceiling

The roofs of all other units are concrete as follows:

Metal deck roofing Aluminium foil sisal 5 inch concrete slab 5/8th inch Tryloean plaster⁵⁵

On 12th April 1961, after months of apparently false starts in the landscape design process, the Commission instructed the Architects to prepare a scheme for the landscaping areas.

In this connection you should work in close collaboration with the Commission's landscape architect, Mr Clough and maintain close liaison with the Department of the Interior, Parks and Gardens Section.

 ⁵⁴ S. Murray to R. Lansdown, 31 January 1961, File 59/723 Part 2, NAA
 55 S Murray to R. Lansdown, 7 April 1961, File 59/723 Part 2, NAA

It is desired that the scheme be planned as simple as possible and with the utmost economy for the execution of their scheme and for maintenance thereafter.⁵⁶

In early May the Commission's Town Planning Department prepared a scheme for the subdivision of the block containing the Garden Flats. The idea was to divide all of the internal common lawn area to the individual Flats to ensure that garden maintenance would be the responsibility of the occupiers. Subdivision would also make possible the eventual sale of the units. In their memo the Department speculated on the need to fence the individual plots or divide them by hedges if a sense of privacy for each was desirable. The subdivision lines extended out to the edge of the surrounding roadway, creating some privately owned land on the street frontages.

The Architects responded on 10th May indicating that if such a proposal was adopted a north-south pathway should be included down the centre of the "common" garden to allow for access, and that the two "internal", free-standing Garden Flats would need to be omitted to facilitate the subdivision. They also requested a ban on fences to the street frontages of the units.⁵⁷ At its Coordination Committee Meeting on 31st May, the Commission supported the deletion of the two Garden Flats and the potential future subdivision of the overall block into separate lots. They noted the construction cost saving as well as the opportunity for a future reduction in the maintenance cost of public lands. The proposal for actual subdivision and erection of fences was deferred.⁵⁸

The decision to allow subdivision troubled the Architects, who wrote to the Commission on 5th June registering their disapproval of the proposed subdivision:

The aesthetics of the "court housing' will be negated by creating back yards without any real gain

Subdivision would mean individual front garden treatments to this scheme whose "walled street" appearance needs overall landscape treatment.

We anticipate a request by the CES and other services authorities (water, gas etc) to locate meters at the front of the houses (instead of in the commons) which not only will be undesirable aesthetically, but will amount to a considerable financial variation, as twelve G Type houses have plumbing and wiring installed.⁵⁹

Also addressed in their correspondence to the Commission on this date was a suggested colour scheme, illustrated on a set of elevational drawings:

⁵⁶ R. Lansdown to Messrs Ancher, Mortlock & Murray, 12 April 1961, File 59/723 Part 2, NAA

⁵⁷ S. Murray to R. Lansdown, 10 May 1961, File 59/723 Part 2, NAA

⁵⁸ National Capital Development Commission Committee, 31 May 1961, A8839, NAA

⁵⁹ S. Murray to R. Lansdown, 5 June 1961, Ancher Mortlock Woolley, Northbourne Correspondence project file #6008

The dark olive green is shown in various shades – not intentional, but final colour will be decided on the job. The actual Tyrolean render is lighter than that shown.

We don't want to pick out too many features of the houses as we feel it will destroy a unity once planting is established – tons of green lawns and tree punctuation. Garden walls (P Type) Carports (F Type) and Ground Floor Entries (M Type) are the best we can do in colour.

Incidentally the base scheme is cream and green – we're nothing if not nationalistic about the Australian tradition!⁶⁰

Finally, the Architects confirmed to the Commission the outcomes from discussions with the District Postal Inspector about street numbering for the various units.

The PMG's Department prefer the brevity of these (suggested) addresses as they help identification without actual street numbers. In the case of the F Blocks, names can be substituted for "Block A" etc. In the case of P Houses, being double entries from both de Burgh Street and Northbourne Avenue, letter deliveries will be from rear cul-de-sacs off De Burgh Street, while small direction boards with group numbers will be erected at both west and east ends of each "green" or "common".⁶¹

A Minute Paper from John Overall to the Commission's Executive Architect, Mr Goldsmith, dated 10 July 1961, raised the need to rapidly resolve the issues of planting and colour schemes:

I would appreciate your arranging for an inspection of the site with myself and the senior partner (Mr Ancher) and the working partner at an early date — if possible by Wednesday of this week. It is requested that, following this, full studies be made of the planting programme and the colour of the buildings and the treatment generally of the site. I would like these to be prepared also in about 10 days, no doubt they are underway now.

It is imperative that we catch this year's planting season and that the colouring is acceptable as part of the Northbourne Avenue pattern. Mr (Gareth) Roberts should be brought into the matter as part of the civic design of the major avenue. [I w]ould like him present at the inspection.

I was most concerned on a recent inspection to see the maze of electric light poles, transmission lines, etc near the site and I would like action to be pressed for the undergrounding of the services of this section of Northbourne Avenue forthwith.⁶²

A fully detailed colour schedule, prepared by the Architects, was included in the file. This has been summarised in the Description section.

⁶⁰ S. Murray to F. Yeates, National Capital Development Commission, 5 June 1961, File 59/723 Part 2, NAA

⁶¹ S. Murray to R. Lansdown, 5 June 1961, File 59/723 Part 2, NAA

⁶² J. Overall to J. Goldsmith, 10 July 1961, File 59/723 Part 2, NAA

The inspection and subsequent reporting by the architects, in preparation of a meeting with the Commission on 20 July 1961, covered a wide range of details within the units, including provision of storage areas, kitchen cupboards, lighting, trims, door stops, handrail detailing and vent pipes. The decision to install only window access to the balcony areas over the garages to the Paired Houses was questioned in relation to the ability of residents to carry chairs out to the these balconies. The Architects felt that the large opening of the lower sash of the full height windows was adequate.⁶³

Several other comments by the Architects in response to the issues raised in the meeting provide further insights into the design outcomes:

Yard Fences:

The design of fences is, in our opinion, in keeping with the general simplicity of design. Alternate designs were considered, their fussiness drawing too much attention and openness and lower heights giving considerable loss of privacy. A creosote finish to the fence and painted cap rail is specified.

Unfortunately, there are no plans in the files to illustrate where the fences were to be located. They are likely to be those on the culde-sac side of the Paired Houses.

Landscaping:

Since final direction from NCDC to prepare landscape plans, several discussions between Messrs Clough (NCDC), Murray (Architects) and Marngles (Parks and Gardens) have taken place. Preliminary landscape plans are in the hands of Parks and Gardens for prices of seeding & planting and suggestions for tree species.

Landscaping of carriageway margins and median strip to Northbourne Avenue, is in the control of Parks and Gardens, who are carrying out general "avenue" planting. Architects disagree with latter treatment (see Recommendation). Provision of lay-offs, kerbs & footpaths is being considered by NCDC officers who are planning for conjunction with site paths, "greens" etc.

General Urban Character: (Architects' Recommendation)

The Architects have the opinion that, in general, the project faithfully contains the intended character within the framework of building form provided. The approach from the north is that of a cohesive group of houses or uniform character.

However, we feel that the planting of gums as intended will not add to the "avenue" character of Northbourne Avenue. Taller, straighter trees of larger branch spread and/or darker foliage planted closer together and nearer the kerbs, are necessary to create the tunnel-like atmosphere of an "avenue". We draw the Commission's attention to the pine-belt south of Northbourne Flats.⁶⁴

⁶³ Supervising Architect, F.E. Yeates, Northbourne Avenue Housing Group site visit notes prepared 17 July 1961, File 59/723 Part 2, NAA.

⁶⁴ Northbourne Avenue Housing Group, Folio 468A-D, File 59/723 Part 2, NAA

5.7.1 The Re-instatement of Four Bachelor Flat Blocks

The involvement of Gareth Roberts, as the NCDC's Superintendant [of] Design,⁶⁵ in the Northbourne Avenue Housing project had an immediate impact. The early idea of building some "point blocks" at the northern end of the precinct was revived.

The Minutes of the Commission meeting on 20 July 1961, at which Messrs Ancher and Murray participated, drew attention to the civic design aspects of the project.

Following reservations expressed by the Commission on aspects of civic design and internal finishes of the housing scheme, Messrs Ancher and Murray attended for discussion on amending proposals.

On the civic design aspects, Mr Roberts indicated on the model, in block form, further buildings which might be added to the two storey group to the north. It was agreed by the meeting that this would provide a desirable addition to the civic design of the total scheme and the architects were requested to examine this in detail and to bring forward for Commission consideration on Monday 24th July, further development proposals which would provide the addition of 4 groups of bachelor flats, each of three storeys. The architect was requested to have preliminary discussions with the contractor to explore prospects of reaching a satisfactory agreement on timing, construction and costs. The Commission believed that to avoid delays and reduce costs, the adaptation of the form of design of buildings already in the group might be possible.

The Architects were also requested to endeavour to arrange with the Parks and Gardens Section for the maximum possible tree planting on the Northbourne Avenue frontage during the current planting season.⁶⁶

The meeting also confirmed the undergrounding of electrical reticulation to all the units from the public roads. A series of refinements were also agreed regarding internal detailing and finishes, including the fitting of guard rails to the interiors of the bedroom windows that reached down to the floor, and the retention of the large, full height sash windows as the only means of access to the balconies over the garages in the Paired Houses.

The following day the Commissioner, John Overall and Executive Architect, John Goldsmith met with Sydney Ancher to discuss his proposals for 3 storey bachelor flats within the housing group:

The sketches showed four blocks placed in the Northbourne Avenue side of the common courtyards to the groups of P type houses containing 6 flats. As a result of the discussion Mr Ancher was told to proceed with obtaining prices from the contractor and to develop his proposals in elevation and planning.

Roberts was later promoted to the role of Director of Architecture. Overall, Canberra, p.45
 National Capital Development Commission Minutes, 19-20 July 1961, File 59/723 Part 2,
 NAA

Points raised and to be included in the further proposals were that:

- 1. Ground floor space not to be open as shown but should be enclosed to prevent unauthorised parking.
- 2. The initial figure for each flat should be in the order of £2,700 to £2,900 per flat
- 3. The standards of amenity within the flats should be similar to the flats built at Condamine Court. Mr Ancher had possessed all these drawings and would continue to work to them.⁶⁷
 A file note from the Executive Architect dated 25th July confirmed the decision to proceed with the Bachelor Flats. Sketches had been submitted by the Architects for approval on the same day.

The Commissioner considered that raising the building up off the ground would raise future problems of requests for car parking under the building. The plan developed provided for three floors of 2 flats each with an entrance vestibule at ground level providing a vista through with the inner courts. It was decided that a possible solution would be the inclusion of a seventh flat at ground level and the space required for a laundry and entrance would be sufficient to avoid a possible use of the open space for parking. It was also agreed that two covered car spaces and some open space be provided at the rear on De Burgh Street.

It was agreed that costs should be retained within a total of £2,900 per flat.⁶⁸

Mr Goldsmith also checked with the Commission's Town Planner as to the advisability of a car parking entry for the flats from Northbourne Avenue. While the Town Planner was agreeable to a small number of cars having access from Northbourne Avenue, Mr Ancher subsequently advised that he considered it better to restrict access to the rear street.

Matters moved very quickly over the following few days. The Contractor agreed to build the Bachelor Flats as a variation to his contract, on the proviso that there was an extension of time granted for an additional 14 weeks.

The Minutes of the Coordination Committee Meeting of 26th July referred to a report on the programming issues for the project.

The Secretary-Manager indicated that the timetable proposed, namely subject to early committal and a July 1962 completion, was acceptable from a programming point of view as Bachelor flats were required for Defence transferees at about the anticipated date.

The Minutes of the Commission meeting of 28th July recorded:

The Commissioner outlined the present situation where it appeared desirable for civic design reasons to add to the northern section of the western group, four blocks of bachelor flats each of three

⁶⁷ File Note, F. Yeates, Supervising Architect, 25 July 1961, File 59/723 part 2, NAA File Note, J. Goldsmith, Executive Architect, 25 July 1961, File 59/723 Part 2, NAA

storeys. On the other hand reservations had been expressed whether the proposals detracted from the original concept of the scheme and the amenity of other units and whether apparent overcrowding could result from the further buildings.

The EA outlined the additional landscaping proposals of the Parks and Gardens Section which included advanced tree planting of cypresses varieties (20 feet), oaks and elms in the courtyards and of advanced shrubs...

Alternatives to the construction of the bachelor flats were examined, including heavy planting, or construction of a large block of bachelor flats at the northern end adjacent to the stormwater drain and the use of vivid colours on the ground floor units.

The Commission considered also the possible effect on the whole scene of the proposed tourist reception centre, and it was considered that civic design-wise this development might assist in providing the affect sought.

Further consideration held over to enable Professor Winston to examine the problem on site.⁶⁹

The meeting was reconvened following discussions with Professor Winston, whose comments were summarised:

- 1. The suggested construction of the additional flats was probably desirable.
- 2. It was also probably desirable to enclose the courtyards and to insulate them against traffic noise.
- 3. Matching construction should be undertaken on the opposite side of Northbourne Avenue in Section 6 Dickson.
- 4. The extra flats would not detract from the amenity of the scheme.

Mr Roberts was asked to incorporate Professor Winston's views in a submission to be discussed by the Commission at its meeting on 31st July.

The Commissioner summed up the progress in a memo to Mr Roberts, dated 31 July,

I refer to our discussions today on the above, following a visit to the site. It is agreed that we will produce an amended scheme and a brief report incorporating the following:

1. Provision of four 7 unit single bedroom flats (five could be used if necessary), to be arranged so that one unit is at the end of the large court area and the other units arranged to provide a fitting entry point into the enclave made by the Ancher scheme.

⁶⁹ National Capital Develompent Commission Minutes, 28 July 1961, File 59/723 Part 2, NAA

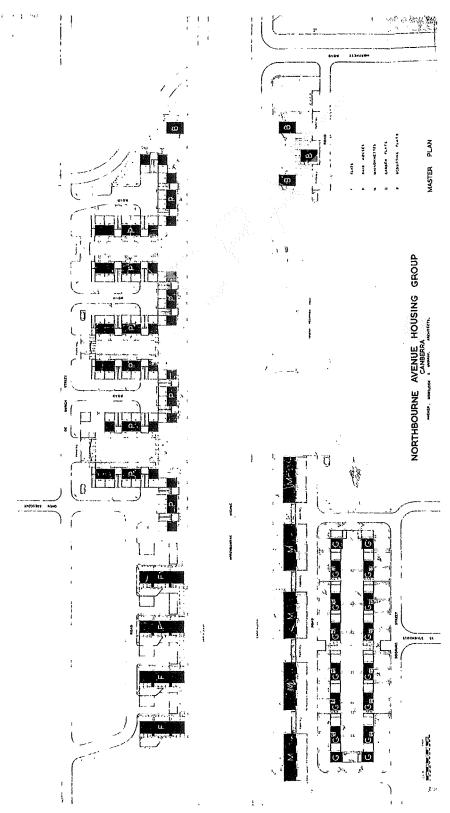


Figure 5.2 Northbourne Avenue Site Plan

Source: Architecture in Australia March 1965

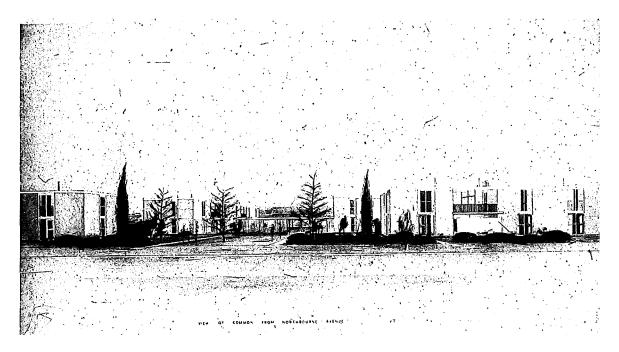


Figure 5.3 Northbourne Avenue Housing: View South Along Northbourne Avenue

Source: Ancher Mortlock & Woolley

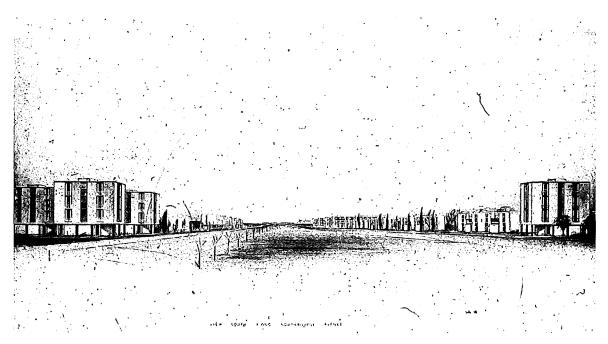


Figure 5.4 Northbourne Avenue Housing: View of Common From Northbourne Avenue

Source: Ancher Mortlock & Woolley

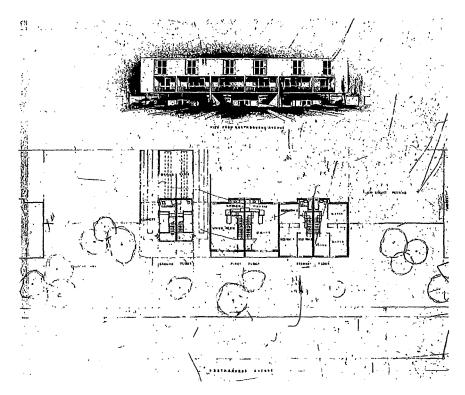


Figure 5.5 Plan of Northbourne Avenue: Maisonettes

Source: Ancher Mortlock & Woolley

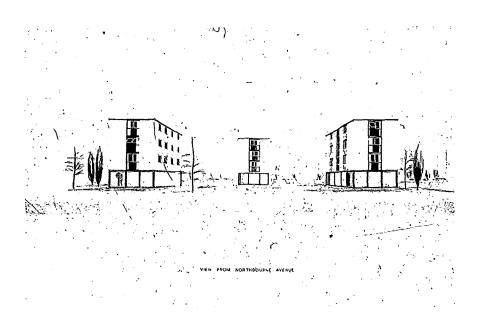


Figure 5.6 Plan of Northbourne Avenue: View from Northbourne Avenue

Source: Ancher Mortlock & Woolley



Figure 5.7 Plan of F Flats: View From North

Source: Ancher Mortlock & Woolley

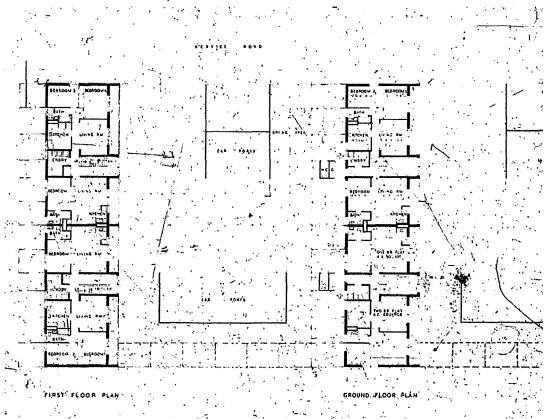


Figure 5.8 Plan of F Flats: Ground and First Floor Plans

Source: Ancher Mortlock & Woolley

- 2. The site plan is to be amended in order to incorporate the tourist area as an immediate planting arrangement and suitably treated, with a site set aside for a tourist and petrol centre...
- 3. A formal and regular group of trees in some emphatic form, evergreen and of considerable height to be arranged and planted this side of the channel or straddling the channel on one side if necessary.
- 4. The fencing to both bachelor units on each side of Northbourne Avenue and behind this planting to be of some definite form, probably painted and to be provided for at a very early date.
- 5. Some pergola or linkage treatment to be provided for across the end of the two courtyards not containing the buildings.
- 6. A definite proposal to be brought forward for the colouring of the houses incorporating some bright colours, at least on doors etc black, white and the present wall colour is not acceptable to me.

The Commissioner was determined that the planting be undertaken quickly to ensure that the completed development would have a high degree of amenity when the first occupants arrived. His memo continued:

I will be asking the Executive Architect to check on such things as letter boxes, garbage can collections and so on, particularly from the bachelor flats, to ensure these are not visible. I understand he will be taking up these points as an urgent measure with Mr Ancher tomorrow.

It is imperative that our public relations be the very best that we can produce, particularly as Mr Andrews has to handle this project in the Advisory Council and elsewhere.

I believe the above proposals will provide a very satisfactory solution to a number of problems. However, I would ask that we have the architects prepare as an urgent measure a revised sketch plan suitable for placing in the press, illustrating the whole scheme, and revised model that can be photographed – and certainly completed within the next 14 days.⁷⁰

The following day, during a meeting attended by Mr Ancher, the Commission agreed on a number of key points:

- 1. That 4 blocks be added as a variation to the contract and that the Architect have further discussions immediately with the Contractor to establish a firm tender price.
- 2. That one 7 unit bachelor flat block, to the agreed design, be sited on the wedge shaped area at the northern end of the group on the western side of Northbourne Avenue and that three similar blocks be sited opposite this block on the eastern side of Northbourne Avenue. The Architect was requested to submit a detailed layout. These blocks to be designed to be an appropriate entry into the total housing precinct.

- 3. Pergolas are to be provided as visual links between the single bachelor flat block and the adjoining 2 storey houses and across the ends of courts B and C, Consideration is also to be given to the similar links between the three blocks to be provided on the eastern side of Northbourne Avenue.
- Tourist Centre Site is to be defined by planting around its perimeter with advanced planting to the Northbourne Avenue frontage.
- The Architect is to consider the introduction of colours to 5. the scheme and suggest colours to be used on doors, balcony rails, under eaves and the undercroft of the three storey blocks.
- In addition to landscaping proposals by the Architects arrangements are to be made for the provision of advanced tree planting across the ends of courts B and C and at the northern end of the group on either side of Northbourne Avenue.
- In order to establish the amenity of the area the Commission 7. indicated that planting, including grassing, should be established prior to occupancy.71

These instructions countered a suggestion by Gareth Roberts, Superintendent of Design, that one of the four proposed bachelor units could be located on the Northbourne Avenue frontage of the southernmost court to the two storey paired houses, known as court A. Mr Roberts considered that this location could be successful as this court is wider than the others and a block here would not be detrimental to the amenity of the group. His suggestion would have left only two blocks on the eastern side of the development:

1. Buildings

Provide four 7 unit, single bedroom flat blocks, in the following

- (a) Block 1 on the Northbourne Avenue frontage of the southern court (A) of the 2 storey houses. This court is wider than the other two courts in the group, and it is considered that a block in this position would not be detrimental to the amenity of the group.
- (b) Block 2 at the northern end of the group between the end house and the creek. This wedge shaped site is restricted in area, and falls away to the creek. The ground floor level of this block should be no lower than the ground floor level of the end house.
- (c) Blocks 3 and 4, in a designed group opposite block 2, on the eastern side of Northbourne Avenue.72

It would also appear that Mr Roberts was the author of the recommendation for pergolas to link the various buildings and building groups together into more visually pleasing compositions.73

File Note, R. Lansdown, 1 August 1961, File 59/723 Part 2, NAA

G.E. Roberts to the NCDC Commissioner, 1 August 1961, Ancher Mortlock Woolley, Northbourne Correspondence, file #6008.

⁷³ See Gareth Roberts' File Note, 1 August 1961, File 59/723 Part 2, NAA

Within a matter of days, Mr Lansdown issued a letter to Sydney Ancher on the subject, confirming the decision that the NCDC had made in this regard:

...It was decided amongst other items that four additional blocks of flats each containing seven or eight bachelor flats would be provided at the northern extremes of the site to improve the Civic Design qualities of the group.

The items covered are as follows:-

1. Additional flats - One block to be sited between the last 'P' type house and Sullivan's Creek on the western side of Northbourne Avenue and the other three to be sited in a 'V' formation perpendicularly opposite on the eastern side. A site planning study and recommendation with sketches to be provided as early as possible within the coming week and if at all possible by Tuesday 8th August, 1961.⁷⁴

With these details resolved, it was a straightforward matter for Ancher, Mortlock and Murray to inform A.V. Jennings Construction Co. that:

Further to discussions between Messrs. Ancher & Murray and Messrs. Armstrong and Tankey of your Company, and following your submission of a firm price for additional blocks of flats in this project, we have pleasure in informing you that our clients, the National Capital Development Commission have instructed us to accept your price for the work on their behalf.⁷⁵

5.8 Completion of the Construction Phase, 1962

By October 1962 the overall construction programme was nearing completion. The Architects and the Commission officers were engaged with such items as obtaining postal addresses for the buildings, ensuring that the landscaping works were well underway and expressing concern that the undergrounding of the electrical services was causing delays.

Although the decision to build the additional four bachelor flats blocks had been made in early September, construction did not start until 6th October 1961. A second extension of time, totalling a further 10 weeks, was then requested by AV Jennings to accommodate the delayed construction start. In recommending support for this claim, in a letter dated 23 October 1961, Stuart Murray noted that although the official date for completion would thus be extended until October 1962, it was anticipated that most of the construction work would be completed by the end of December 1961 and of the additional blocks by April 1962.⁷⁶

Correspondence was opened with the Department of the Interior regarding the likely final costs of the various unit types within

⁷⁴ R. Lansdown to S. Ancher, 4 August 1961, Ancher Mortlock Woolley, Northbourne Correspondence, file #6008.

⁷⁵ Ancher Mortlock and Murray to The Manager, A.V. Jennings Construction Co., 21 August 1961, Ancher Mortlock Woolley Northbourne Correspondence, file #6008.

⁷⁶ S. Murray to R. Lansdown, Extensions: Northbourne Avenue Group Housing, 23 October 1961, File 59/723 Part 3, NAA

the development. These were used as the basis for setting the anticipated rents for the units.

By late November 1961 correspondence commenced regarding the forthcoming Defence Transfer and the allocation of a number of the units in various blocks for Defence personnel. The expectation for occupancy of some units in late January and February was countered that while some units had been allocated, construction delays may mean that some personnel may need to be temporarily accommodated in hostels. A Minute Paper, dated 23 November 1961, noted that the Paired Houses would be ready for occupation by 31st December, the Garden Houses by 5th January, the Owen Flats progressively through February and early March and the Maisonettes by the end of March 1962.

Suggestion for Additional Paired Houses

On 14th March, Sydney Ancher wrote to John Overall with a suggestion for the erection of three additional groups of the Paired Houses on the site of the proposed Tourist facility.

It seems to us that the building of three blocks of Pair Houses, as shown on the accompanying plans, could complete the Northbourne Housing Group in a very satisfactory way.

The doubts which have, on occasion, been expressed concerning the scale of the Pair Houses are not shared by us. On the contrary we consider the Pair Houses to be, in every way, the most successful of all the types, and believe the whole scheme would be enhanced if these particular type houses were repeated on the eastern side.⁷⁸

Interestingly, it was only the establishment of the three Bachelor Flat blocks on the eastern side of Northbourne Avenue that changed the dynamics of the original project. Originally, only the western side of the Avenue extended the full 500 metres or so along the frontage. The eastern presentation was limited to the much smaller frontage of the five blocks of Maisonettes. The new Bachelor Flats were located in a somewhat isolated location, well to the north, reinforcing the gap in any composition created by the reservation set aside for the tourist reception centre.

Two weeks later Gareth Roberts, the Superintendent of Design, wrote a Minute Paper in response to the Architect's suggestion.

A first sight Mr Ancher's proposal has considerable merit and I have listed below the factors for and against it which occur to me.

<u>For</u>

a) It would provide a unity of architectural treatment along both sides of this section of Northbourne Avenue.

⁷⁷ Minute Paper, P. Brewer, Co-ordinating Architect, 23 November 1961, File 59/723 Part 3,

⁷⁸ S. Ancher to J. Overall, 14 March 1962, File 59/723 Part 3, NAA

b) There is no doubt that the pair house design is too small in scale for the width of Northbourne Avenue and the scheme has been justifiably criticised on the grounds that domestic scale development is not appropriate on this most important Avenue. The wisdom of locating the tourist reception centre in the midst of the development, where many tourists entering the City will stop for the first time, can be questioned. The use of the site for an extension of the group housing scheme, and the consequent relocation of the reception centre would overcome this.

<u>Against</u>

- a) It can be argued that to increase the quantity of the two storey development will only aggravate the problem of scale on the Avenue.
- b) The most satisfactory part of the existing pair house development is the grouping around the re-entrant courts. This does not exist in the proposal, which provides for these pairs of houses to be parallel to the Avenue.

On balance, I am against extending the group housing scheme in the manner suggested provided a satisfactory design for the tourist reception centre is forthcoming and will be built in the future.⁷⁹

The Executive Architect, John Goldsmith, had also sought the view of the Commission's Chief Town Planner, Peter Harrison. He advised that the tourist reception centre was in fact imminent now that leasing issues had been resolved. His recommendation to the Commissioner was that the tourist centre option be allowed to run its course. Time was of the essence in order to "tie the whole area together". His recommendation was formally endorsed by the Commission at its meeting of 9th April 1962.

Completion

On 16th March 1962, the Architects were able to report to Robert Lansdown, the Secretary-Manager of the NCDC, that the majority of the dwellings had been completed and handed over between early December 1961 and mid-March 1962. Still to be completed were two Maisonette flat blocks and four blocks of Bachelor Flats. This was considered a good outcome, as "on the whole, completion is two months ahead of contract schedule."81

Subsequently, on 28th June 1962, the Architects wrote to the Commission confirming that the last of the Maisonette blocks had been handed over as "practically complete" on 2 April 1962 - again, ahead of the anticipated schedule. For the four remaining Bachelor Flats, the time extension gave AV Jennings until 28 August 1962, but Stuart Murray anticipated "practical completion" on 29 June

⁷⁹ G. Roberts, Superintendent of Design, to J. Goldsmith, Executive Architect, 26 March 1962, File 59/723 Part 3, NAA

⁸⁰ J. Goldsmith to the Commissioner, File 59/723 Part 3, NAA

⁸¹ S. Murray, to R Lansdown, 16 March 1962, File 59/723 Part 3, NAA

1962. The six month long Defects Liability Period for each building, during which time any initial maintenance issues are dealt with by the Contractor, was advised.⁸²

There were a number of complaints from newly installed residents about relatively minor issues to do with the construction or finishes. These were responded to as required.

On 17th July 1962 the Commission was able to notify the Director of Works that all the various buildings had been completed and handed over to the Department of the Interior for occupation.⁸³

The following month, the NCDC's Acting Secretary and Manager, L.W. Engledow, requested that Ancher, Mortlock and Murray: forward details of the following final costs:

- a) Costs of 47 pair houses
- b) Costs of 30 Maisonettes
- c) Costs of 18 Garden Houses
- d) Costs of 24 1 Bed flats
- e) Costs of 24 e Bed flats
- f) Costs of 28 Bachelor flats
- g) Costs of Landscaping
- h) Costs of Engineering Services including roads drains and water mains excluding the services within the curtilage of the buildings.

The costs of the buildings should include the services (except gas) paths and fencing for the particular area involved.⁸⁴

On 10th January 1963, Stuart Murray, on behalf of the Architects, formally notified the Commission that the Defects Liability of the Northbourne Avenue Community Housing project had expired. This document provided specifics as part of its Notice of Final Completion:

House Type	Street Nos	Practical Completion Date
Р	96-116 De Burgh St	15/12/61
Р	66-92 De Burgh St	15/12/61
Р	38-62 De Burgh St	15/12/61
P	39-55 Owen Crescent	15/12/61
GF	55-69 Dooring St	08/01/62
GF	4-18 Dooring St	08/01/62
F	259, 257 Northbourne A	lve 07/02/62
F	255, 253 Northbourne A	lve 28/03/62
М	288-298	
	276-286	
	264-274	
	Northbourne Ave	28/03/62
М	252-262	
	240-250	
	Northbourne Ave	02/04/62
В	1, 2, 3, 4	29/06/62

Accordingly the Contract was finally completed.85

⁸² S. Murray to R. Lansdown, 28 June 1962, File 59/723 Part 3, NAA

⁸³ R. Lansdown to The Director of Works, 17 July 1962, File 59/723 Part 3, NAA

⁸⁴ L.W Engledow to Messrs Ancher Mortlock and Murray, 23 August 1962, Northbourne Correspondence, file #6008.

⁸⁵ S. Murray to R. Lansdown, 10 January 1963, File 59/723 Part 3, NAA. See also Ancher

A performance review supplied by Ancher, Mortlock and Murray to the NCDC in March 1964 summarised their experience throughout the project. The issues to be reviewed included:

1 Client Requirements: Community Housing Project of one, two and three stories (specifically no multi-storey buildings) to mask existing building sprawl from highway.

Specific house types requested, together with no road entries from highway, no yards or drying areas visible. No chimneys or solid fuel dumps.

Four-storey development added to restore cohesion owing to lack of high rise building. Adds some focal point to urban character which is still nullified by width of highway and large space for Tourist Centre.

2. Description of Site: Two long narrow strips running North-South (1550' x 150/220/ - 6.5 acres) Lyneham (770' x 250' - 4.8 acres) Dixon each side of Northbourne Avenue, twin-carriage highway 200' wide.

Site is treeless, flat with slight central depression (1'-0") and southern rise (2'-0").

- 3. Master Planning: Site characteristics and client requirements give road patterns of loops and cul-de-sacs, with off-street parking. Two storey housing pattern similar to Radburn.
- Nature strips and 25'-0" building lines requested as far as possible.
- 4. Urban Character: Unified expression of town scale and character required. One and two storey buildings linked to achieve this, with identical roof form, external finish and window types to relate different building types.

5. Housing Types:

Flats (F)

Four blocks, 3-stories, each contains 12 flats, two stairs 1 laundry per 2 flats. Each flat faces north with balcony. Separate carports (1 per flat). Drying yeard and motor court.......48

Pair Houses (P)

Eleven blocks, two-stories, each contains one pair semi-detached and two single houses with interlinks of double carports. Radburn type cul-de-sac car entry, front entries from commons. 66% North aspect 3-bed type.......47

Maisonettes (M)

Five blocks, three stories, each constains 6 terraces or row houses with carport-laundry-entry on Ground Floor. Rear access from loop road. East-west aspect. 3-Bed type....30

Garden Flats (GF)

15 single storey houses, linked with garden and carport. Rear kitchen and laundries open into internal common for services, drying, children. Entry through courtyard. All Living Rooms north aspect with garden. 2 Bed type.......12

1-Bed type......4

Bachelor Flats (B)

Four blocks, 4 stories, each has 7 bedsitters. All face north. Separate carports -1 per 3 flats......28

- 6. Internal Planning: P, F & M type houses economically planned on basically traditional principles. G.F. types approach "court house" planning, while retaining frontage and rectangular sites for subdivision (client request).
- 7. Landscaping: A programme scheduled as occupation progressed was carried out by the Dept. of Parks & Gardens, with grass seeding and the planting of early and advanced tree stock, a mixture of both natives and exotics.

A semi-automatic lawn watering system of bayonet sprinkler fittings on quick-coupling cocks was installed.

- 8. Structure: Engineering of part frame (steel post) and part loadbearing (external 11" walls) was used in conjunction with concrete floors and roof. Economics in this system (mass-produced) were as cheap as traditional methods.
- 9. Materials: Tyrolean external wall finish throughout to maintain unity. Simlarly flat metal decks to concrete roofs. Colours used solely on entry doors, garden wall panels, and railings. Windows timber frame with aluminium sashes. Latter sections proved somewhat light for each size but undue trouble is not anticipated.
- 12 Performance Report
- 12.1 Management: Due to the experimental nature of mass production, using on-site methods, more management control from the foreman was necessary, but close co-operation with the Builder's ordering and costing section was kept at all times, and this functioned very smoothly.
- 12.2 Site Control:Owing to the physical size of the site, sectional sub-foremen were appointed for different house types. Daily reports were taken in the main Foreman's office and problems resolved satisfactorily.
- 12.3 Workmanship: Job duration 28th October 1960 to 29th June 1962, progressed steadily through two severe trade fluctutation, which were definitely felt in the job. However, the Clerk of Works and Foreman were adamant about high standard of finish and speed respectively. Some labour trouble was experienced but this did not affect the job, which was completed two months ahead of schedule.
- 12.4: Clerk of Works: The Clerk of Works carried out his duties with considerable efficiency considering the size of the site and complexity of the work.

His supervision of finishes was of great assistance at all times.

12.5: Consultants: The Structural Engineer (Mussen) was an inspiration to all who came into contact with him. His ability to "think with" architects was outstanding, and his approach to difficult problems resulted in extremely simple but practical solutions.

The Civil Engineer (Gossip) gave closer supervision to his work than anyone on the project and his diligence impressed all.

13. Architect's Comments:

13.1 Master Planning: Long, narrow, depressed sites, east-west aspect, flat, treeless, lining a 200' wide twin carriageway, but not opposite each other combined with requests for "fronting up" along the highway with 3-storey work, **no** multi-storey towers, and subdivisional requirements for 2 and 1 storey work were the main factors in severely inhibiting the scheme by reducing "skyline" topography and cohesive village character.

13.2 Detail Planning: While this office planned the requested house types, documented and supervised to the best ofits ability and quite satisfactorily, results could have been better for (a) planning reasons mentioned in 13.1; (b) more available statistical information being available from Housing Authorities, correlated information being made available on similar problems arising from preceding job, and co-operation and information from Service Authorities; and (c) a separate site works contract being let for a cleaner site and less apparent confusion during building.⁸⁶

The final construction cost, as reported to the Commission by the Architects on 1st April 1964, was £779,318.87 This figure was arrived at through adjustments for £185,334 in deductions and £279,868 in variations.

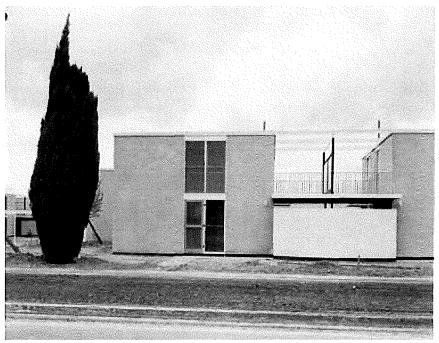


Figure 5.9 Northbourne Avenue development phase, 1961

Source: National Archives of Australia

⁸⁶ Ancher, Mortlock and Murray, Performance Review re: Northbourne Avenue Community Housing, 12 March 1964, Ancher, Mortlock and Woolley, Northbourne Correspondence, file #6008

⁸⁷ S. Murray to R. Lansdown, 1 April 1963, File 59/723 Part 3, NAA. See also Final Account Summary, Project No. A731/3- N.C.D.C. Northbourne Avenue Group Housing.

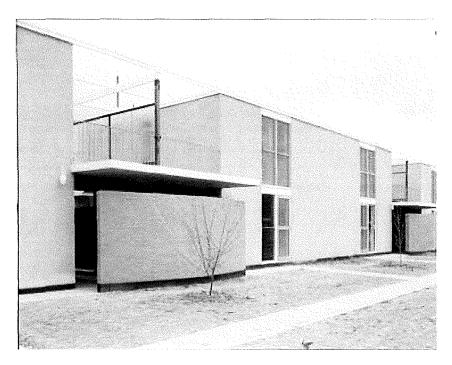


Figure 5.10 Northbourne Avenue development phase, 1961

Source: National Archives of Australia

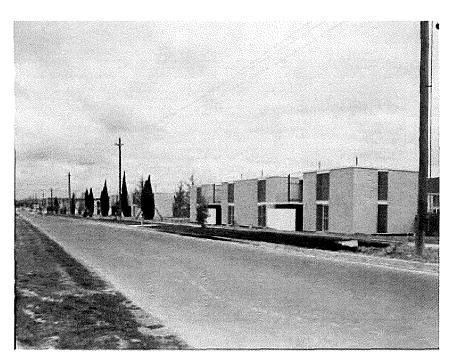


Figure 5.11 Northbourne Avenue development phase, 1961

Source: National Archives of Australia



Figure 5.12 Bachelor Flats Source: National Archives of Australia



Figure 5.13 Maisonettes Source: National Archives of Australia

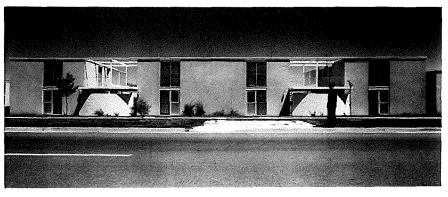


Figure 5.14
Paired Houses
Source: National Archives of Australia

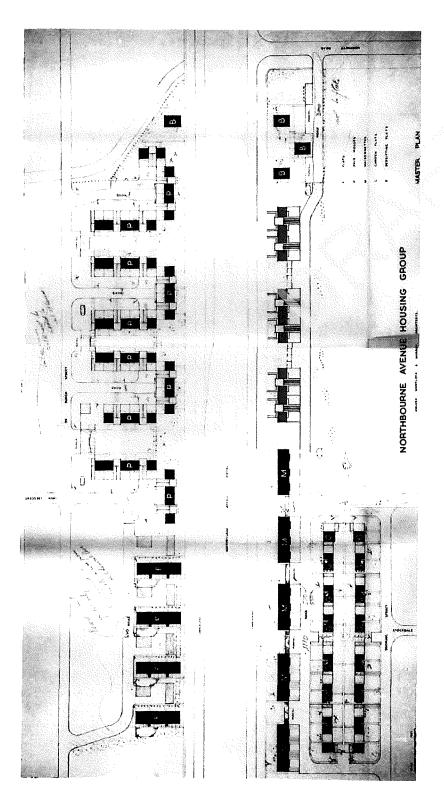


Figure 5.15 Amended master plan showing the additional housing proposed by Sydney Ancher Source: National Archives of Australia

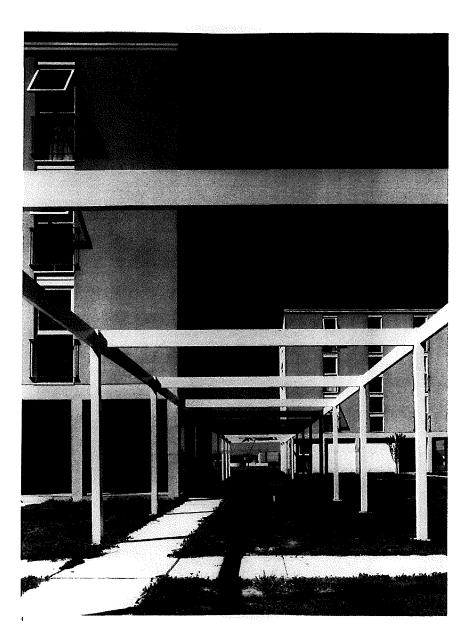


Figure 5.16 Northbourne Avenue Housing Group, photographed by Max Dupain Source: *Ken Woolley and Ancher Mortlock & Woolley*

5.9 Initial Occupation

A Minute Paper from the Executive Engineer (Construction) to the Director, Finance and Legal, dated 23 August 1962, provides an interesting insight into the way that rents were established for new dwellings in Canberra. It demonstrates the reason why the Commission had kept such a tight control over the construction costs per dwelling unit, in order to keep rents as competitive and attractive as possible. In the initial phase of occupation the units were largely targeted at public servants being transferred into Canberra, primarily from Melbourne:

To fix rents in accordance with Government direction, the Department of the Interior require advice from the Commission on the actual cost of each building and dwelling.

In the case of flat projects this presents some difficulties, but nevertheless as far as it is practicable, an attempt should be made to properly analyse and dissect costs.

Having examined the plans I have formed the conclusion that the engineering services works, i.e. roads, kerbs and gutters, drainage associated with the road work main water and main sewerage should not be a charge against the project, but be a charge against the Residential Development Engineering Services. My reasoning is that because of the traffic classification of Northbourne Avenue, direct access of vehicles from individual dwellings or buildings is undesirable – hence some form of service access would at some time have been provided by NCDC for development of the site. A parallel case is the Service Road that has been constructed to enable the eastern side of Northbourne Avenue in Downer to be developed for residential purposes. Also because of the special "entrance to Canberra" position of these buildings, more than usual landscaping was undertaken and this also should not be a charge against the dwellings.

Based on the available information from the Architects, original estimates and the Contractor the Memo outlined the most reasonable cost allocation for each dwelling:

Two Bedroom flats	£3521
One Bedroom flats	£2841
Three Bedroom Semi Detached Houses (Paired)	£5333
Three Bedroom Maisonettes	£5402
Two Bedroom Courtyard Houses	£4667
One Bedroom Courtyard Houses	£400488

At this stage the Bachelor Flats were not included. Their cost was confirmed by early September and rents fixed accordingly at £4 per week for these particular dwellings.

It is also of interest that to reinforce his argument to the Commission the author noted that the access roads of this project have been gazetted as public roads.

⁸⁸ P. Funda, Executive Engineer (Construction) to the Director, Finance and Legal, 23 August 1962, File 59/723, Part 3, NAA

5.10 A Mixed Reception

The relatively unusual Post War International Modernist architecture of the housing group, with their absence of pitched roofs, combined with their location on Northbourne Avenue, generated some early criticism.

In a Minute Paper, dated 3rd October 1962, for the Commission Coordinating Committee, the Acting Commissioner made the following observations which reflect the continuous process of rigorous design review:

The recurring theme of criticism of the Ancher flats in Northbourne Avenue has been mentioned in many submissions by Mr McKernan.

In meeting members of the Royal Australian Chemical Institute prior to delivering an address to them during this week, quite pungent criticism of these flats was expressed by a score of members. It was apparent that their arrival in Canberra during the late afternoon of Monday (the public holiday) gave them an opportunity to see the flats with Monday's washing clearly visible from the Avenue.

In addition, therefore, to the criticism of the "Casbah" nature of the buildings, this unkempt and untidy appearance had apparently made a profound impression on them.'

I suggest the Committee examine ways and means of further screening this group of buildings from the view along Northbourne Avenue.89

Interestingly, one of the main criticisms levelled at the modernist design of some of the mass housing projects in Germany in the late 1920s was the reference to the 'casbah' inferring that the buildings gave an impression of North Africa.

After reviewing the situation, Gareth Roberts, by then the Chief Design Architect, having replaced the Executive Architect, John Goldsmith, recorded the following File Note, dated 17th October 1962:

I do not think that there is much more that can be done to plant out the view and the general appearance will change little until the existing planting has matured sufficiently to soften the hard angular lines of the buildings.

There is no doubt that the re-entrant courts between the pair houses are much pleasanter now that the grass has developed, and I would recommend that the grassing and kerbing of the medium strip on the Avenue, for the whole length of the group, be carried out as a matter of urgency. In its present state the median strip contributes as much as anything else to the generally untidy appearance of the group.

89 Memorandum for Co-ordination Committee, 3 October 1962, File 59/723 Part 3, NAA

The tidiness of the balconies and the hanging of washing elsewhere than in the places provided is a matter of domestic housekeeping, the control of which is not easy to enforce, even if it were desirable. I think it might be worthwhile inviting the tenants to take a greater pride in the group, by means of a carefully worded circular, explaining the importance of the group on the main approach road into the city, and emphasising the efforts which were being made to maintain a high standard of appearance by landscaping and the provision of street furniture.

At the time of my visit dust bins were set out for collection on the footpaths at the rear of the group, the contents of some of which were spilt. There is a real need for a suitable container to be provided to overcome this and I will resubmit a design which has previously been prepared for this purpose.⁹⁰

It appears that Mr Roberts' memo was not taken up by the Coordinating Committee, as a subsequent summary of the discussions noted a request to Mr Roberts, in conjunction with Mr Clough, to "bring forward a proposal for the planting of up to 20 mature trees in this area, to further soften the lines of the buildings."91

5.11 Early Teething Problems

By February 1964, two particular issues had arisen that generated some concern within the senior staff of the Commission – the erection of unauthorised fences to the Northbourne Avenue frontage of the three storey Maisonettes and requests for the installation of fly screens to the front doors of these buildings.⁹²

Internal correspondence within the Commission in February 1964 showed that they were concerned that many of the tenants in the Maisonette Flat buildings had erected fences on the Northbourne Avenue frontage; while it was most likely as a safety measure to prevent young children accessing the major traffic artery, the Commission were concerned about the negative presentation of the buildings. It was noted that of the 30 units in the five blocks, 13 had fences of varying types – wire mesh (3), brick (3), lattice (5) wood slat (1) masonite (1).⁹³

The Commission wrote to the Department of the Interior, Housing Branch on 5 February advising them that:

Front fences have not been provided to other row houses in Canberra nor is it the practice to do so in other states. Front fences along the Northbourne Avenue frontage would be out of character with other developments on the Avenue and, furthermore, there must be some doubt whether a fence would keep children off Northbourne Avenue.

As you know there is at the rear of these units an equipped children's play area as well as a quiet access road.⁹⁴

- 90 File Note, G. Roberts, 17 October 1962, File 59/723 Part 3, NAA
- 91 Item 4 17 October 1962, File 59/723 Part 3, NAA
- 92 Minute Paper, 26 February 1964, No.60/349, File 59/723 Part 3, NAA
- 93 Statement, n.d., File 59/723 Part 3, NAA
- 94 R. Lansdown to the Acting Commissioner for Housing, 5 February 1964, File 59/723 Part 3, NAA



Figure 5.17 1961 aerial photograph, showing the Northbourne site under development Source: NSW Land and Property Information

The discussion within the Commission also raised the more sensitive issues about selecting families without very young children for the Maisonette units, the forced removal of the fences and the likelihood that they would eventually be replaced by the occupants. The potential danger of young children being injured by traffic where the fences had been forcibly removed was also a factor to be considered.

A second issue at the time was the installation of fly screen doors on the front entry doors to the Maisonette dwellings. The Commission had a policy of only fitting screen doors to the rear doors of its units. The dilemma is that the Maisonette buildings only had one external door. An undated file note observed that screen doors had recently been fitted to other flat developments in Canberra but only after representations from the residents.

5.12 Public Housing Management Regime

Following the initial occupation of the various housing units throughout 1962, the Northbourne Avenue Housing Precinct settled into a routine of long term tenancy management and maintenance through a succession of public authorities and the transfer from Commonwealth to ACT management.

Completion of the Northbourne Housing Precinct in 1962 co-incided with the publication in the US of Jane Jacob's "The Death and Life of Great American Cities." She critiqued modernism and its common open spaces - claiming that 'unowned' spaces were one of the main reasons for rising crime rates. The long term influences of this book and its debate was a preference for private open spaces over common space, and for defendible open space where residents overlooked and could care for common spaces.

The introduction of brick garden walls around the Paired Houses and Maisonettes was probably influenced by this thinking, with the Paired Houses subsequently fitted with private courtyards, defined by face brick walls. These courtyards reduced the common open space between the groups but added significantly to the private amenity of each dwelling.

The maisonettes, which were fitted out with recessed balconies off the living areas on the middle level, presented with an unusual façade composition. The ground floor level was reserved for entries and service rooms, without an adequate ceiling height to be classed as habitable rooms. The front courtyards were enclosed by brick walls in response to security and safety concerns. Car access to the maisonettes was from the rear, via a small service road. The rear courtyards were then enclosed to provide a level of privacy.

5.13 Progressive Landscape Improvements

An important aspect of the Northbourne project was the overall visual impression to be gained from the long term landscaping of the Northbourne Avenue site. The NCDC was determined to use the landscaping of Northbourne Avenue to form an important visual, physical and symbolic role of their main approach route into the city.

Northbourne Avenue itself was planted with large trees in the late 1930s in accordance with the design by Charles Weston. 55 These were later replanted in 1949 by Lindsay Pryor, who was adamant that the aim of the tree planting was to have trees of suitable scale which would enhance the appearance of buildings rather than hide them. 56

The landscaping of the Northbourne site was initiated in the early 1960s by the Executive Architect of the NCDC, John Goldsmith, through discussions with John Gray of the ACT Parks and Gardens Department; Gray was in later years to become the Chief Landscape Architect of the NCDC. Goldsmith and Gray sought to implement plantings that would mitigate the visual impact of the housing complex when seen from Northbourne Avenue. It was also intended to complement the existing treed avenue entry into Canberra, and to blend with both the architecture and the site layout.

Two major planting phases were carried out:

- 1) Early/mid 1960s under the direction of John Gray
- 2) Three phase project c.1979/80 designed by Deverson Scholtens Bombardier (DSB Landscape Architects) for the NCDC under the name 'Lyneham/Dickson Maisonettes."

In the original phase, Gray preferred tall growing tree species, with some of the plantings established on site to be relatively advanced in order to deliberately create an immediate visual impression. Amongst the species selected were edrus deodara, Cedrus atlantica, Casuarina cunninghamiana, and Cupressus arizonica. A number of the Northbourne Avenue trees were transplanted from nursery plots on the northern shore of Lake Burley Griffin (now the Lindsay Pryor Arboetum). Chief amongst the selected species was the Casuarina cunninghamiana, which was suitable for landscaping purposes and used throughout the national capital, including on the land axis in the area north of Old Parliament House. Cupressus arizonica was also a favourite, both with Gray and his predecessors Weston and Pryor.

Mixed in with these key species were specimens of *Prunus cerasifera* (plum), *P dulcis* (Almond) and *P mume* (Japanese Flowering Apricot). Again, these species had been popular with Weston and Pryor, and tend to be indicative of the older landscaping patterns of Canberra.

⁹⁵ Canberra Times, 6 May 1939

⁹⁶ Memorandum 22 February 1949 from Pryor, Superintendent Parks and Gardens to Assistant Secretary Canberra Services Branch, Department of the Interior (NAA:A431/1 1953/1198, cited in Ken Taylor, Canberra: City in the Landscape



Figure 5.18 Northbourne Avenue Housing Group, 1963, showing both completed buildings and landscaping Source: National Library of Australia

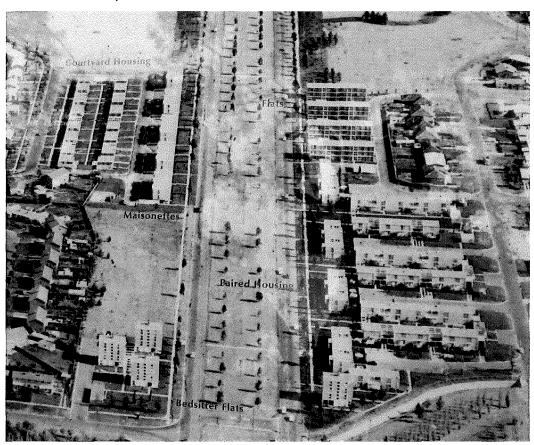


Figure 5.19
1966 aerial photograph from the north showing the lack of landscaping around the De Burgh Houses at this time

5.14 The Heritage Status of Northbourne Avenue Housing Group

By the 1990s, the Northbourne buildings had become dilapidated and were considered unsuitable for contemporary residential purposes. The prospect of demolition became a real consideration, with proposals for site redevelopment intending to retain a small section of the Precinct. Few from the wider community defended the Northbourne Housing Group; within architectural and professional circles, however, the new of prospective demolition was received with dismay. Graham Trickett, of the ACT Chapter of the Royal Australian Institute of Architects, together with Ken Woolley, spearheaded a campaign to save the Northbourne Precinct based on its architectural and historical significance. Architectural historian Jennifer Taylor concurred, arguing that

The Northbourne Avenue Housing is not Ancher's finest architectural work, but it is a unique project that holds an important place in the architectural history of Australia, and one that contributes positively to the Canberra environment.

It is of the highest importance that the group be maintained in its totality as it is the very fact of its extent, the mixed housing examples it contains, and in its urban qualities as a large housing estate that its prime contributions as an historic example and urban element lie. To retain but a small section would undermine the rational of its [sic] existence as an historical and urban work worthy of conservation.⁹⁷

In a letter to The Canberra Times, Woolley contended that: Sydney Ancher's housing on Northbourne Avenue should be preserved. It is his only large medium density housing design and as he did not have a large output, its heritage significance is even greater. It was also one of the earliest government housing projects in Canberra on which distinguished architects were engaged. This is one of the most interesting aspects of the history of Canberra, having been virtually a living exhibition of contemporary Australian architecture in the 50's, 60's and 70's, under the enlightened sponsorship of the National Capital Development Commission.

While the public did not really warm to Ancher's project, thinking it rather spare, even severe, this would not be a [sic] historian's assessment. With the passage of time it can be seen as disciplined, frugal in accordance with the economics of its brief and intellectually rigorous. Of course the space standards and materials quality are not what would be provided today, but the same can be said of housing for the common people in the Georgian period, much valued today for its proportions and urbanity, which we complement by adaptive re-use.⁹⁸

⁹⁷ Jennifer Taylor to Graham Trickett, 26 November 1996, in Ancher Mortlock Woolley files, Heritage Consideration - 1997.

⁹⁸ K.F. Woolley to The Editor, *Canberra Times*, 22 May 1997. Ancher Mortlock Woolley files, Heritage Consideration - 1997.

However, on 9 April 1997, the ACT Heritage Council opted not to include the precinct on the interim Heritage Places Register. Instead, it was recommended that "the adaptive re-use of some of all of the garden flats, maisonettes, and the surrounding landscape be pursued." Amongst the reasons for rejecting the proposed inclusion on the interim Heritage Places Register was the suggestion that the extent of Sydney Ancher's involvement in the project was unclear, and that there was little evidence of the Precinct demonstrating a high degree of technical and/or creative achievement.

These grounds for refusal were rebutted by Trickett and Woolley, and support for the retention of Northbourne Precinct was bolstered through the media; Peter Ward was but one journalist who wrote that "Saving Ancher's Northbourne housing is an issue as worthy of national attention as Canberra itself," and that if the site was redeveloped "a lamentable precedent will be set that could threaten any of Canberra's significant buildings from the heroic period....." Eminent architectural historian Jennifer Taylor has written to say that Ancher was 'one of the most important architects of the midcentury in Australia and this is a unique project in his career...to my knowledge this is the only large housing project in Australia that is so evidently directly inspired by the Weissenhoft, Stuttgart scheme.

"This is undeniable in the characteristics, such as the white cubic massing of the units, the various 'types' of accommodation provided and in their disposition to each other. This makes the project significant on a national scale." 100

Similarly, the National President of the Royal Australian Institute of Architects, Eric Butt, communicated with the Australian Heritage Commission, stating that:

The Royal Australian Institute of Architects believes that Sydney Anchor's [sic] housing on Northbourne Avenue, known as the Northbourne Housing Precinct, is of national architectural significance and supports its Heritage Registration.

The housing was commissioned and designed as National buildings and are of National significance. They are an excellent example of the modern movement by a leading Australian architect who is recognised as one of the seminal proponents of modern architecture in Australia.

The RAIA recognised Sydney Anchor's [sic] importance to architecture by awarding him the Gold Medal in 1976.

There are many examples where adaptive reuse of buildings has occurred successfully without compromising the architecture. 101

⁹⁹ Diana Williams, Secretary for the ACT Heritage Counctil to Graham Trickett, Convenor, Register of Twentieth Century Architecture Committee, The Royal Austriaian Institute of Architects - ACT Chapter, 7 August 1997. Ancher Mortlock Woolley files, Heritage Consideration -1997.

The Weekend Review, 16-17 August, 1997.

¹⁰¹ Eric G Butts to Sharon Sullivan, Executive Director, Australian Heritage Commission, 26 August 1997, in Ancher Mortlock Woolley files, Heritage Considerations - 1997.

Refuting the claim that Ancher himself was not directly involved with the project was Bryce Mortlock, who confirmed that:

the project was Syd's baby from start to finish. It was Syd's design, and I think it not unlikely that Sydney did some of the drawings in his own hand - certainly the sketch plans and perhaps some working drawings. The rest would have been done by Stuart Murray under Syd's direction and Stuart would have handled most of the contract administration side of things. I played no part in it whatsoever.

As we know, Syd was inclined to take a sort of wry dismissive attitude to his works once they were completed - they always fell short of his original, probably unattainable, concept - but I suspect he kept a secret place in his heart for the Northbourne project. After all, it was a major work, arguably the largest of his career.¹⁰²

Having obtained supplementary information from key players to support listing, Woolley and Trickett aimed to appeal, and in early 2000 Northbourne Housing Precinct was added to the Interim List of the Register of the National Estate by the Australian Heritage Commission. This was followed in 2002 by recognition from the Register of the National Estate, but remained as Nominated only on the ACT Heritage Register.

Bryce Mortlock to Ken Woolley, 5 October 1997, in Ancher Mortlock Woolley files, Heritage Consideration - 1997.

The Northbourne Housing Precinct

6.0

6.1 Architectural and Planning Innovations in Post War Flat Development

The Northbourne Avenue Housing Precinct drew on and further developed certain aspects of a number of the post-war flats projects that preceded it. These ideas were blended with the profound knowledge held by Sydney Ancher of the Inter-War Modernism architecture and large scale housing developments with which he was familiar in Europe.

The large common courts, formed by the Paired Houses, which opened out to Northbourne Avenue reflect the splayed open courts in the Red Hill Flats project which was under construction immediately before this project. The architectural frame used by Ancher was more consistent than the mixed architectural presentation at Red Hill, where the sloping topography provided a different outcome.

The enclosed common area formed by the way the single storey Garden Flats encircled the whole block had been a common device for many of the early post war flats in Ainslie and Griffith, although Ancher retained the common space for pedestrians and had the resident parking integrated with each dwelling.

The elevation of the Karuah Maisonettes, providing individual covered parking and ground floor laundries was a development on the elevation of sections of the earlier Bega-Allawah and Northbourne Ave flats developments, where common ground floor parking was made available for the various flats above.

The elevation of the Bachelor Flats onto a form of pilotis to provide the additional height required for civic design purposes was a further development of the elevated flats projects.

The three storey walk-up Owen Flats continued the mainstream form of accommodation for many of the other post war flats, although in a very distinctively different architectural style. The planning layout reflected the consistent orientation to maximise sun access that had been a feature of Gower Court.

The use of groups of covered carports and driveways between the individual Owen Flats buildings and behind the Bachelor Flats was a device that had been a common feature of many of the earlier flats projects.

Distinctive differences developed by Ancher for the Northbourne Avenue Housing project were partly driven by the narrow dimensions of the combined sites, their civic design contribution and the need to adapt the required high level of standardisation to a variety of accommodation types. It is also apparent that the project was also deliberately experimenting with different forms of medium density housing types while achieving the civic design presence through unity of form and architectural expression.

The differences from previous public housing projects in post-war Canberra include:

- Sydney Ancher introduced a major new architectural language to public housing in the ACT Post-War International Modernism. While some of the previous flats developments such as Gowrie Court, Bega-Allawah and Northbourne Avenue had provided some architectural references, such as elevated under-crofts and relatively flat roofs, Ancher's scheme was a fully developed and well executed version of the International style. It was applied across all five of the building types in a consistent and comprehensive manner, whereas some of the mid 1950s examples had a greater variety of architectural expression but lacked a clear and concise presentation as a result.
- The Paired Houses, with their separation of pedestrian and vehicle access to individual dwelling units, was a device that had not previously been used in Canberra and which reflected some of the Radburn Planning Principles¹ used for large scale housing development in post-war Britain.
- The use of single storey Garden Flats with integrated parking and private courtyards that combined with the larger amenity of the common open space in the centre of the block.
- Individual, three story walk up Maisonettes with private rear courtyards, laundries and integrated parking, grouped as blocks of five town houses along the main frontage.
- Full coverage north-facing balconies to each dwelling in the Owen Flats was a departure from the smaller private balconies that had been adopted for the earlier 1950s flats projects such as Gowrie Court.
- The unification of the various components of the overall project by a network of pergolas, parthways and screens on each of the major precincts. These defined and drew the connecting open spaces around various housing models together in a more cohesive and comprehensive manner than with previous developments in Canberra.
- The introduction of service roads and cul-de-sacs to provide direct access to the private parking associated with the Paired Houses, Karuah Maisonettes and Garden Flats, plus to the shared carports of the Owen Flats and the Bachelor Flats.

¹ http://www.docstoc.com/docs/90035996/NATIONAL-TRUST

6.2 Site Description Sources

The following Description comprises information taken from a number of sources in addition to visual appraisal at the site.

These sources are:

- An article in *Architecture in Australia*, March 1965. It would have been prepared by or based on material supplied by Ancher Mortlock and Murray.
- The Report on the Northbourne Housing Project, prepared by Ancher Mortlock & Murray, Architects. It was presented to the NCDC to accompany the submission of the final Master Plan, on 21st December 1959.
- NCDC File Notes April 1961
- The colour scheme reported in NCDC File Notes in July 1961
- A report from the Architects towards the end of the construction process summed up the landscape planting proposals

6.3 The Northbourne Avenue Context

The current urban context of the site on Northbourne Avenue has developed considerably from the relatively sparse residential suburban context of the original development in the early 1960s.

The section of Northbourne Avenue that includes the subject site is part of the main northern entry corridor to Canberra. To the north it is lined with relatively low scale medium density residential development on the western side of the Avenue and a small number of low and medium rise commercial and retail developments with large areas of surface car parking. New high rise residential development is located at the intersection with Antill/Mouat Streets. To the south are larger scale medium rise commercial and hotel developments defining the southern edge of the precinct on both sides of the Avenue, with the medium rise commercial tower on the corner with Macarthur Avenue. In the centre of the Precinct, on the eastern side of the Avenue, lies the Tourist Information Centre, a long, low single storey building surrounded by car parking.

The suburban areas to the east and west of the Precinct comprise primarily single storey free standing residential houses, with some two storey houses. The small block between Owen Crescent and de Burgh Street comprises a row of recently constructed three and four storey residential flat buildings that have replaced a row of single cottages. Northbourne Avenue and the main streets forming the suburban edges to the precinct tend to be lined with mature trees which complement the collection of mature trees that characterise the existing spaces between most of the buildings within the Precinct. The exception is Owen Crescent to the west of the Owen Flats, where there are no street trees of any substance.



Figure 6.1 View along Northbourne Avenue



Figure 6.2
The stormwater drainage channel fringing the Northbourne site



Figure 6.3 View along Northbourne Avenue with large scale commerical building to the immediate south of Owen Flats

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd



Figure 6.4 Aerial montage of the subject site

6.4 The Overall Precinct

Consistent with the design brief issued by the NCDC, the Northbourne Avenue Housing Precinct forms an ensemble of residential buildings, comprising a number of different accommodation types, stretching for some 500 metres along the Avenue in Dickson and Lyneham. What the buildings lack in height is made up for in the length of the frontage. Five different building types, comprising single, one, two, three and four storey buildings are arranged in five groups, each with its own distinctive and cohesive character. The five groups are:

- Four, four storey, free standing "Bachelor Flat" buildings, located at the northern end of the overall Precinct. One building is located on the western side of Northbourne Avenue, three are located on the eastern side.
- Groups of two storey "Paired Houses" arranged along the western side of Northbourne Avenue in a continuous rectangular zig-zag pattern that creates an alternating pattern of common courts opening to the main frontage and shared cul-de-sac roadways providing car access from De Burgh Street at the rear.
- Four blocks of three storey residential flat buildings, known as the "Owen Flats", arranged in a repetitive row at right angles to the Northbourne Avenue frontage.
- The "Karuah Maisonettes" comprising five, three storey linear building forms, arranged in a line running parallel to the Northbourne Avenue axis. They form the major architectural imagery of the project on the southern side of the Visitors' Centre.
- The "Garden Flats" arranged in a continuous line around the entire perimeter of the lot, enclosing a linear common green space. These flats are located behind the Karuah Maisonettes and are the only building type that is not visible from Northbourne Avenue.

The distinctive visual character of the Precinct is derived from the continuity of the Post War International Modernism architectural expression across the different buildings, combined with the mature landscaping and layers of secondary features such as garden walls.

The apparently restrained visual and architectural composition of the overall Precinct was derived from the original paramount objective set for the project by the NCDC for economical construction to achieve the minimum possible construction cost per unit. The buildings were designed and specified within the prevailing housing standards for public subsidised housing in the ACT. Standardisation of elements such as windows and materials such as external Tyrolean render, was an important technique, contributing to the continuity and unity of the architectural treatment and resultant imagery across the entire project, despite the mix of building types.



Figure 6.5
The Owen Flats at the southern end of the Precinct

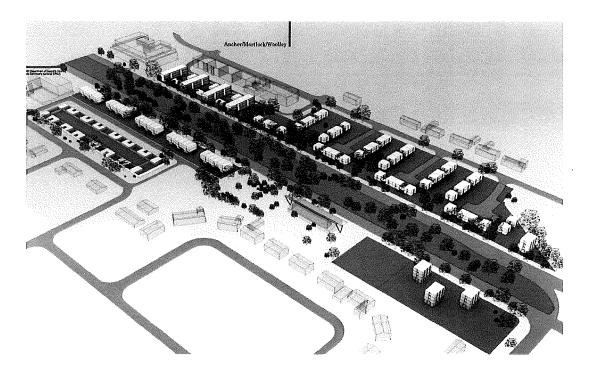


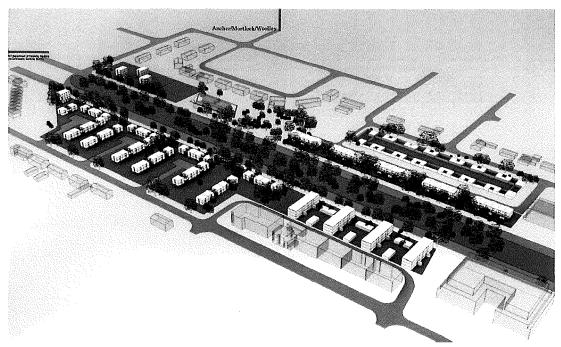
Figure 6.6
The four storey Bed Sitter Flats that were used to provide the vertical dimension of the "gateway" concept.



Figure 6.7
The Karuah Maisonettes on the eastern side of Northbourne Avenue screened the rows of single storey Garden Flats from Northbourne Housing.

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd





Figures 6.8 and 6.9

The existing Northbourne Housing Precinct Source: Ancher Mortlock Woolley

Architect's Description at Masterplanning Stage, 1959

The following description is taken from the Report on the Northbourne Housing Project, prepared by Ancher Mortlock & Murray, Architects. It was presented to the NCDC to accompany the submission of the final Master Plan, on 21st December 1959.

Site Planning

Owing to the restrictive nature of the site, both in physical dimensions and traffic circulation, the usual standards for allotment areas in the Australian Capital Territory have been departed from, but the usual distances from the Main and Secondary Roads for building alignments have been maintained.

Internal service roads have a width of 24 feet and parking bays for visitor parking have been provided for Pair Houses, Maisonettes and Courtyard Houses. Multiple Carports have been provided for Flats (groups of 4) and Courtyard Houses (groups of 3).

In the grouping of the various housing types and the general arrangement within the groups, the main aims have been achieved, viz. to maintain an ordered and unified presentation to Northbourne Avenue with buildings of urban scale and character; and to provide as far as possible on a narrow site the maximum of dwellings of good orientation (97 housing units have the living room and at least one bedroom facing North.

Architecture in Australia, 1965

The following description over the overall Precinct was included in an article in *Architecture in Australia*, March 1965. It would have been prepared by or based on material supplied by Ancher Mortlock and Murray.

Client Requirements:

Community housing of specified types limited to one, two and three storeys (specifically no multi-storey buildings) with a unifying expression of town scale and character to conceal existing building sprawl of average suburban development each side of the highway.

Four storey flats added to scheme to restore cohesion owing to lack of high-rise building. Adds some local point which is nullified by highway bifurcating the site. Car entry from highway forbidden and concealment of drying areas requested. Alternative requested to electric or solid fuel heating (latter to eliminate chimneys and fuel stores). Specific nature strips and building lines (25 feet) required.

Resultant site plan gives pattern of road loops, cul-de-sacs, offstreet parking and common areas between housing types. Urban character achieved by house links, garden walls, commons, identical roof forms and finishes.

Area of the Site

Two long narrow strips (1,550 feet x 150/220 feet – 6.5 acres; 770 feet x 250 feet -4.8 acres) on east and west of twin-carriage highway 200 feet wide. Site is treeless, flat with slight central depression (1 foot) and rise to the south (2 feet).

6.5 Common Features of the Various Housing Types

The 1959 Master Planning Report prepared by the architects identified a number of common or standardised features that were incorporated to achieve economy of scale and cost efficiency.

Housing Standards

Generally, requirements of the NSW Housing Commission and current ACT Housing projects have been used as a guide in planning. However, more emphasis has been placed on sizes of living rooms to achieve maximum usable living space in the majority of houses which, in this project, are three bedroom family units. Finishes, internal and external, are of a higher standard than the NSW Housing Commission, and a list of additional amenities and fittings are included in our Quantity Surveyor's Summary as well as in our general description.

Structure

To make full use of the obvious advantages of bulk materials and labour in repetitive work, a structure capable of common application to all unit types has been recommended and evolved by our Consulting Engineer. Normal load bearing external masonry walls are to be used with reinforced concrete foundation piers where applicable. "Flat slab" concrete floors reinforced with steel mesh are proposed, supported internally by 3 inch and 4 inch diameter solid steel columns (fire proofed with sprayed concrete) on reinforced concrete foundation pads and erected in one length. Repetition of spans and economic structural design to include cantilevers will achieve a high order of structural economy. Flat roof decks will also be concrete; this is to avoid the use of structural framing timbers entirely and also to achieve a high order of fire proofing.

This approach to a simple structural system frankly expressed will do much to achieve the architectural unity which is one of the essentials of this project.

Materials and Finishes

The use of common brick 11 inch cavity load-bearing external and division walls between units is proposed, finished internally with render, externally with "Tyrolean" finish (integral colour). Internally walls are 3 inch timber stud partitions lined with fibrous plaster.

Internal brick walls were cement rendered and given a sponge finish internal walls after sanding with extra fine sand or steel trowel finish in laundries.

Ceilings are finished with white Tyrolean (white cement and marble dust). Floors are screeded as laid and finished with heavy duty linoleum on paper felt underlay. A magnesite underlay for 100% impact noise insulation was used as an alternative to the omission of plaster ceilings and "off-form" ceilings substituted.

Ceramic floor tiles are allowed for in bathrooms and steam-pressed enamelled asbestos cement wall sheets to bathroom walls. Kitchens have tiled backups to units. Windows shall be timber box-framed in three basic sizes. Joinery shall be in local timbers, such as Mountain Ash, for the obvious economy. Flyscreens to all external windows have been allowed.

The roofs of all units, with the exception of the Garden Units consist of a 5 inch concrete slab overlaid with aluminium foil sisal and metal deck roofing, with metal gutters and downpipes. Roofs over the Garden Flats were timber framed with 3/8th inch fibrous plaster ceiling, 2 inch glass fibre or "Slagwool" insulation, 4 inch air space between rafters, aluminium foil sisal and metal deck roofing.

<u>Fittings</u>

Kitchen equipment consists of a three-plate electric stove (twoplate in one bedroom flats), four foot six inch stainless steel sink and 70 cubic feet of standard space including top cupboard, and benches with drawers, vegetable storage etc. Space is left for a refrigerator. In all housing units except flats, separate Dining Areas are planned. Bathrooms are fitted with a low-down suite, (separate WCs in Courtyard and Pair Homes, extra WC to Maisonettes, 5 foot bath and shower (shower recesses in all units except two bed flats) wall basin.

Laundries have an electric copper and tubs. In some cases provision is made for installation of a washing machine.

Linen and broom cupboards are provided, together with wardrobe (hanging space only).

<u>Services</u>

Instantaneous "twin-heat" three phase electric hot water systems are provided in all units. Power points and lights are allowed. All plumbing in copper, a one pipe drainage stack system allowed for.

There was a considerable amount of subsequent research undertaken during the project to identify the preferred form of heating. The final decision, taken in August 1961, was for propane gas for cooking and space heating. It was described at the time as being the first use of gas fuel for Commonwealth housing in Canberra.

6.6 Colour Scheme Recommendation, 1961

The colour scheme reported to the NCDC in July 1961 was as follows. In general the colour scheme was consistent across the entire housing group, complementing the consistent architectural presentation.

	[
External Walls of main buildings	Light beige pre-coloured
and garden depots (Storage	Tyrolean render
buildings)	
Garden Walls	Olive
External Walls Carports and	Olive for flats, white for Paired
Garage Screen walls	Houses
Internal walls of carports	White
Exposed edge of ground floor	Dark brown, described as
slabs	"Peat"
Balcony exposed slab edge	White
Balcony Soffits	White pre-coloured Tyrolean
·	render
Exposed edge of upper level	White
slabs	, , , , , , , , , , , , , , , , , , ,
External Wrought iron	Olive
Obscure glass spandrels &	Pewter
bottom sashes	
All external timberwork, eaves,	White
eaves trim, pergolas, external	
doors, eaves, gutters and	,
downpipes	
Fences	Creosote
Gas tank surrounding walls	Natural beige concrete block

In the public stairwells, the internal colours were to be finished with white ceilings, grey walls, black floors and stair treads, white balustrade and red handrails. Individual flat entry doors were to be painted from a selection of blue, yellow or green primary colours.

There was some discussion from the Commission late in the project construction phase for the introduction of some additional coloured finishes on the common stairs entry doors.

6.7 House Types

6.7.1 Bachelor Flats

The four storey Bedsitter Flats were designed to give the entire Precinct greater vertical scale and responded to concerns expressed by NCDC during the development phase about the civic design of the scheme. There were three such buildings on the eastern (Dickson) side and one on the western (Lyneham) side of the Avenue.

Four blocks, four storeys, each has seven bed-sitters. All face north. Separate car ports – one per three flats. Total accommodation 28 units.

Ground floor was compromised of the main entry, mail boxes, common laundry and an additional flat. A notable feature was the elevation of the main 3 storey block onto ground floor columns, and a curved wall that defined the entry.



Two of the three buildings were built in close proximity to the Northbourne Avenue frontage, reinforcing the "gateway" nature of their role.



Figure 6.11
View of the group of three flats buildings from the internal access driveway



Figure 6.12 Detail of Bachelor Flat exterior



Figure 6.13
Detail of main entrance to Bachelor Flats building



Figure 6.14 Exterior of Bachelor Flats, showing building entrance

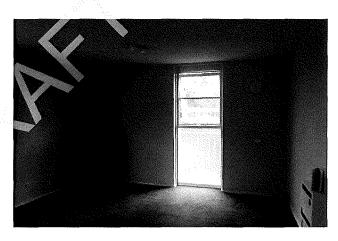


Figure 6.15
Typical lounge room space of bachelor flat dwellings



Figure 6.16 Internal stairwell



Figure 6.17 Bachelor Flats carports

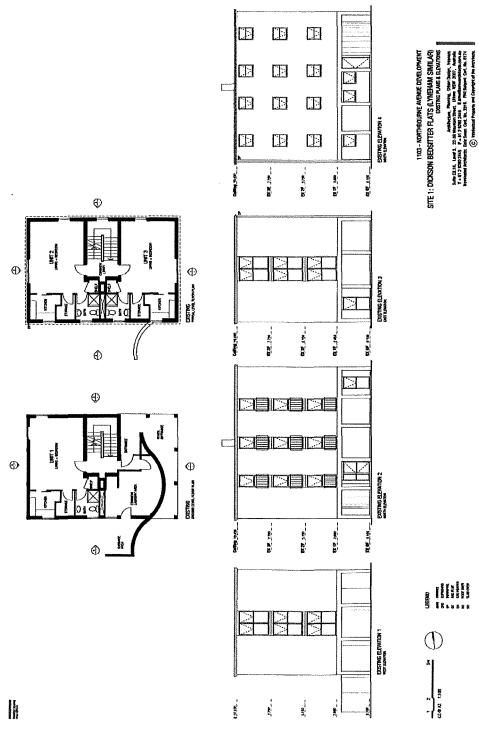


Figure 6.18 Measured drawing of the Bachelor Flat dwelling type Source: Ancher Mortlock & Woolley

6.7.2 Paired Houses

The arrangement of the Paired Houses, with a sinuous pattern of housing units interspersed with common landscaped open space and driveway areas, reflected the Radburn planning layouts of prewar English new town planning theory. The common courts were enclosed at the De Burgh Street end by a curved garden wall.

The Paired houses were actually arranged in groups of four. The two inner houses were linked by a pair of carports with a recreation deck above. The carports were originally screened by curved walls facing Northbourne Avenue. While facing directly out to either the main road or the common landscaped areas, the houses were entered from the rear, or shared driveways.

Eleven blocks, two storeys, each containing one pair of semidetached and two single houses with interlinks of double carports. Radburn type cul-de-sacs car entry, with front entries from commons. Sixty six percent north aspect. Total accommodation 47 units.

An additional attached house was located at the De Burgh Street end of some groups. Small free standing garden stores were located at the De Burgh Street frontage. Face brick courtyard walls were added several decades later.





Figure 6.19
The Paired Houses were subsequently fitted with private courtyards, defined by face brick walls. These courtyards reduced the common open space between the groups but added significantly to the private amenity of each dwelling.

Figure 6.20 View into the common driveway and parking area "behind" the groups of Paired Houses.



Figure 6.21 View of the Paired Houses from the roadway



Figure 6.22 View to the rear of the Paired Houses, showing courtyards ar internal pathway

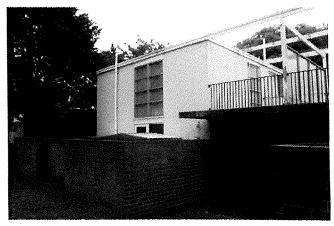


Figure 6.23 View showing private courtyard spaces

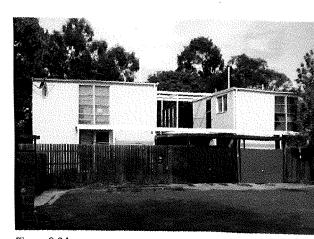


Figure 6.24
Paired House dwelling along the boundary of the Northbourne



Figure 6.25 View of Paired Houses showing the courtyards and internal pathway network through the site

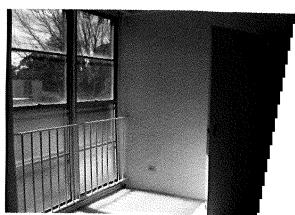


Figure 6.26 Interior of Paired Houses

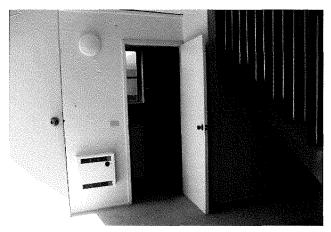


Figure 6.27 interior of Paired House type dwellings, showing kitchen and internal stairs

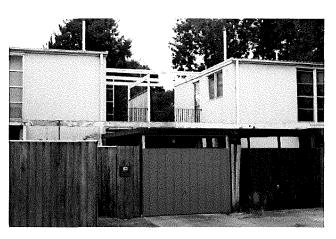


Figure 6.28 View showing recreation decks on upper level of Paired Houses



Figure 6.29 Carport space adjoining Paired Houses



Figure 6.30 View of the rear of the two storey dwelling type



Figure 6.31 Curved walls facing Northbourne Avenue which serve to screen the Paired Houses

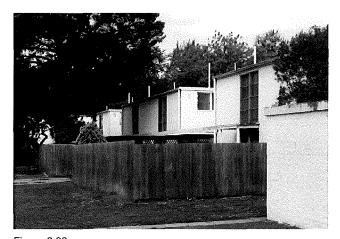


Figure 6.32 View of Paired Houses grouping

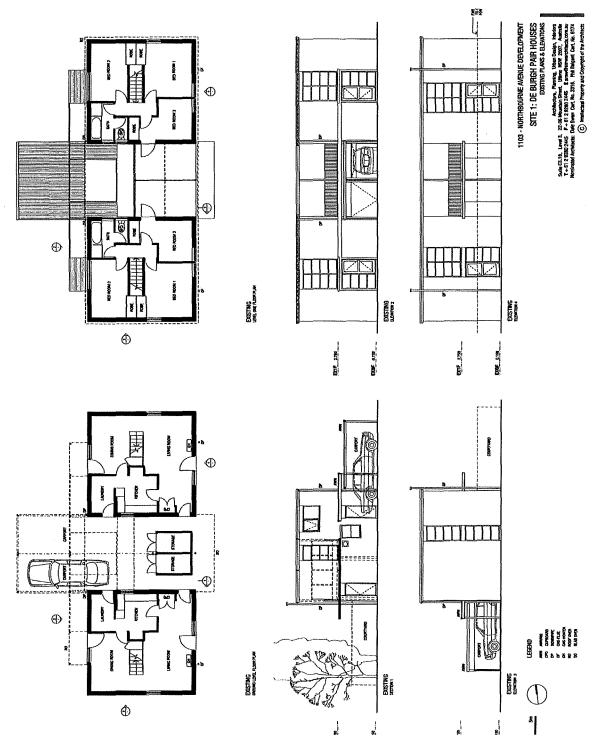


Figure 6.33 Measured drawing of the De Burgh Paired Houses Source: Ancher Mortlock & Woolley

6.7.3 Owen Flats

The Owen Flats were arranged in a rigid block-like form, with every flat given a northward facing, recessed balcony. Individual flats were accessed via a common stair, with larger and smaller flats opening from the stair on each level. Unlike the remainder of the Precinct, the Owen Flats utilised a model that was reasonably well established in post-war architecture, particularly in Melbourne.

Four blocks were arranged at right angles to the Northbourne Avenue frontage, with generous spacing between each block. Car access was arranged from the rear street. Driveway access from Northbourne Avenue was not allowed in the project design brief.

Four blocks, three storeys, each containing 12 flats, two stairs, one laundry per two flats. Each flat faces north with a balcony. Separate carports were provided (one per flat). Drying yard and motor court were included. Small covered store attached to rear elevation at each stair well. Total accommodation, 24 one bedroom and 24 two bedroom flats.



Figure 6.34
The north facing elevations are enlivened by a regular pattern of deep horizontal balconies and

vertical stair wells.

The ground floor units opened directly to the common landscaped open space in front of each block



Figure 6.35
The southern, or rear, elevation was relatively unadorned.

This photo shows the direct relationship with the pedestrian pathway on the Northbourne Avenue frontage.



Figure 6.36 Rear view of the Owen Flats, with its simple and strongly repetitive rhythm overlooking the internal pathway



Figure 6.37 North facing elevation with recessed balconies



Figure 6.38
Freestanding separate carport for each flat, located behind the southern elevation of the dwellings



Figure 6.39 View of Owen Flats and car motor court



Figure 6.40 Southern elevation showing building entry



Figure 6.41 Southern elevation of Owen Flats, with the internal pathway adjacent



Figure 6.42 Detail showing deteriorating condition of building fabric



Figure 6.43
Detail showing deteriorating condition of building entry



Figure 6.44 Contextual view showing the norhern elevation with landscaping and internal pathway

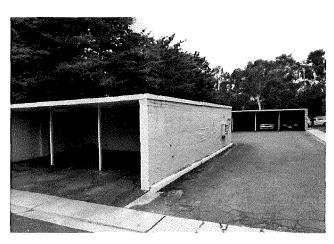


Figure 6.45 Individual carports for Owen Flats, arranged in a motor court style



Figure 6.46 Owen Flats: Bedroom space



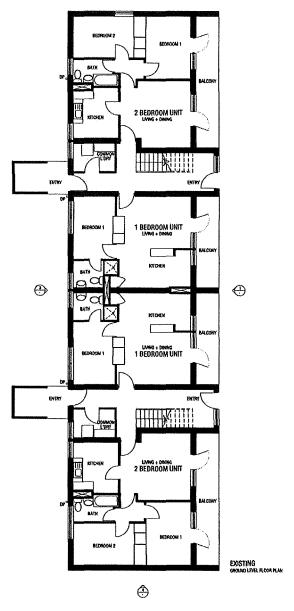
Figure 6.47
Typical interior of Owen Flat dwelling, showing kitchen and dining area

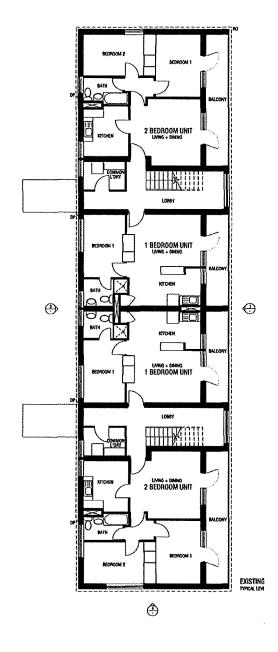


Figure 6.48 Owen Flats: typical bathroom fitout



Figure 6.49 Owen Flats: Internal stairs and landing





LEGEND

ANN ANNING CPO CUPBOARD OF DOWNEYE OF GAS FLUE GH GAS HEATE RO ROOF OVER

Suite C3.18, L Y + 61 2 9280 Nominated Arch

Figure 6.50 Measured drawing of Owen Flats Source: Ancher Mortlock & Woolley

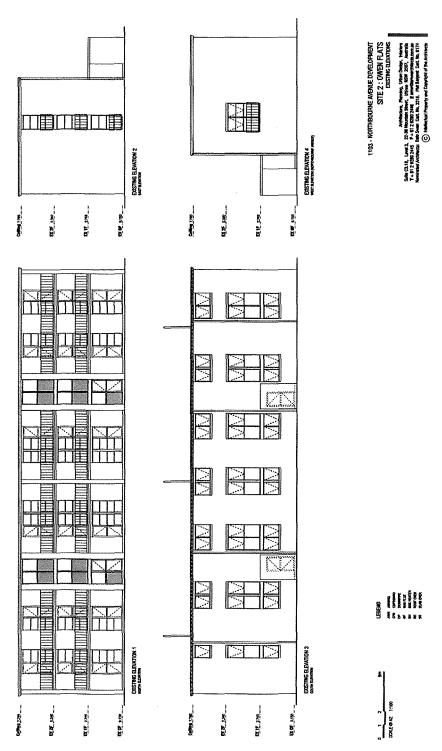


Figure 6.51 Measured drawing of Owen Flats Source: Ancher Mortlock & Woolley

6.7.4 Karuah Maisonettes

The Karuah Maisonettes comprise five, three storey linear building forms, arranged in a line running parallel to the Northbourne Avenue axis. They form the only architectural imagery of the project on the southern side of the Visitors' Centre on the eastern side of Northbourne Avenue.

Five blocks, three storeys, each contains six terrace or row houses with carport – laundry – entry on ground floor. Rear access from loop road. East – west aspect. Total Accommodation 30 units. Garden walls were added later.

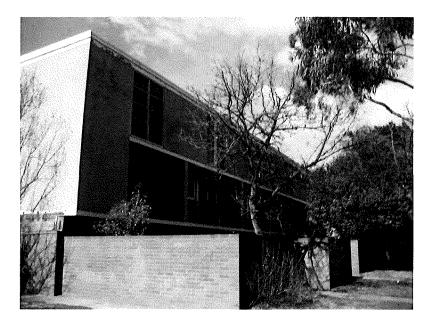


Figure 6.52

The maisonettes have an unusual façade composition in that the living areas on the middle level were fitted with recessed balconies.

The ground floor level was reserved for entries and service rooms, without an adequate ceiling height to be classed as habitable rooms.

The front courtyards were enclosed by brick walls in response to security and safety concerns.



Figure 6.53 Car access to the maisonettes was from the rear, via a small service road.

The rear courtyards have been enclosed to provide a level of privacy.

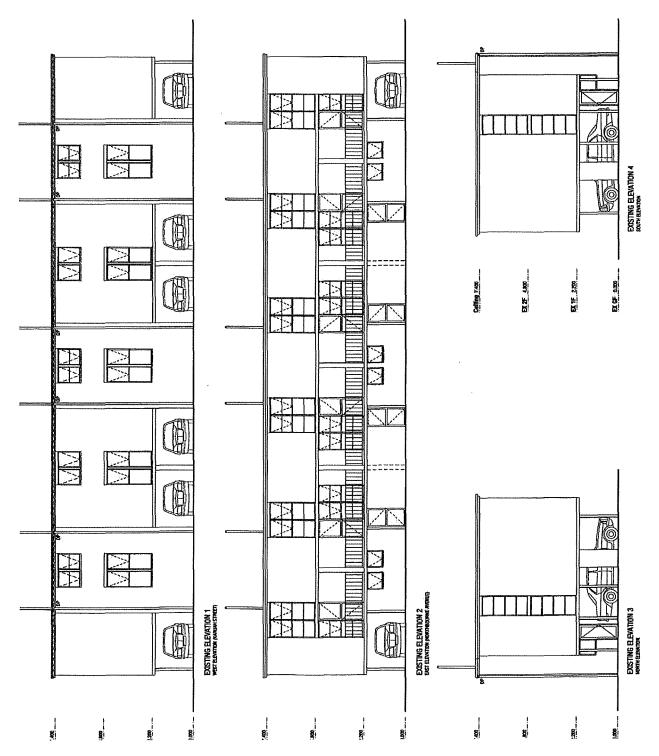


Figure 6.54 Measured drawing of Karuah Maisonettes Source: Ancher Mortlock & Woolley

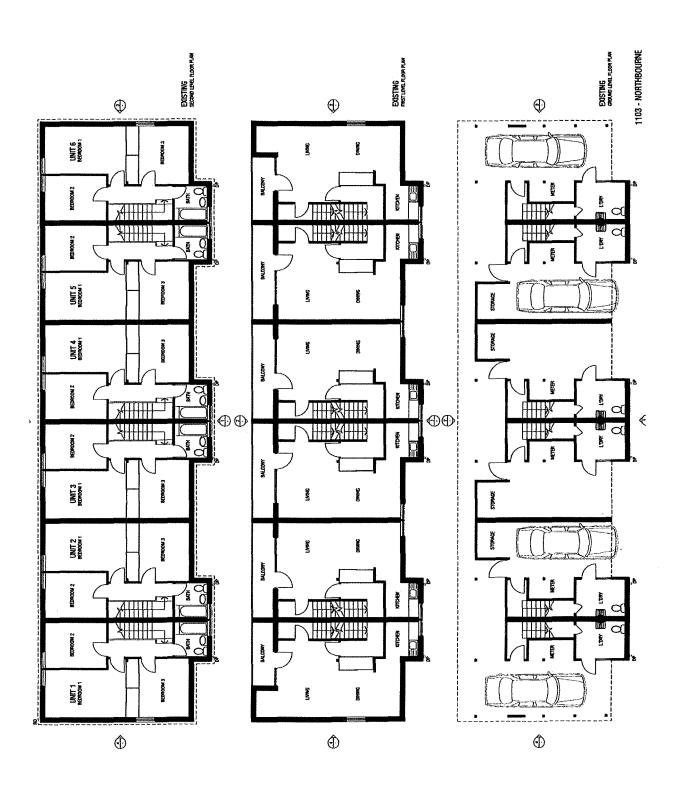


Figure 6.55 Measured drawing of Karuah Maisonettes Source: Ancher Mortlock & Woolley

6.7.5 Garden Flats

The Garden Flats were entered via a small private courtyard from the street frontage. Each had a side court that served as part open space and part vehicle parking area. The long, low and internalised, or self-contained, arrangement of these houses gives a very restrained presentation to the more traditional, neighbouring residential cottages.

Sixteen single storey houses linked with garden and carport. Rear kitchen and laundries open into internal common for services, drying, children. Entry through courtyard. All living rooms with north aspect and garden. Total accommodation 16 units.



Figure 6.56
The single storey Garden Flats were arranged around a common open space



Figure 6.57
The common landscaped space in the centre of the group of Garden Flats was a unique feature for Canberra at the time.



Figure 6.58 View of Garden Flats from the street



Figure 6.59
Open common space with internal pathway network



Figure 6.60 Garden Flats open space



Figure 6.61 Garden Flats side court and carport



Figure 6.62 Garden Flats side court

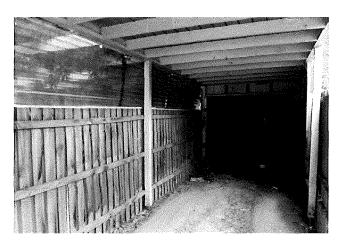


Figure 6.63 Garden Flats vehicle parking

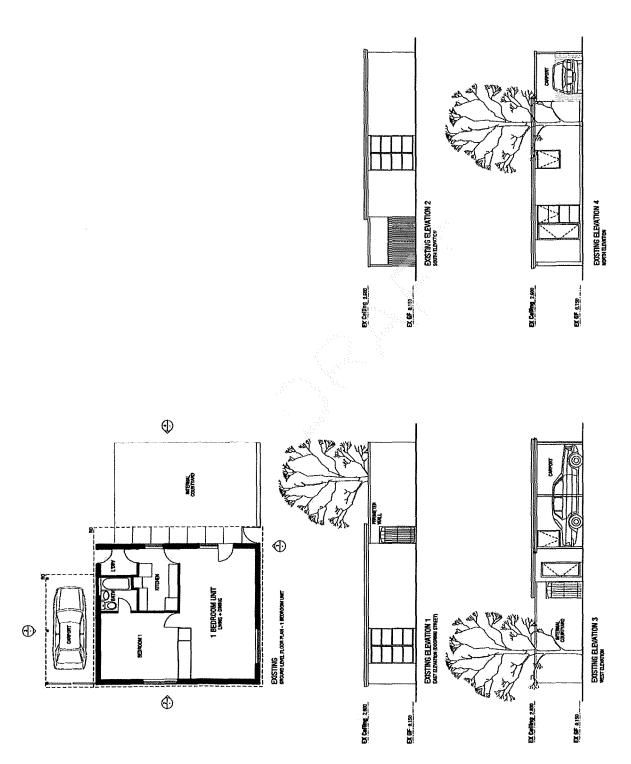


Figure 6.64 Measured drawing of 1 bedroom Garden Flats Source: Ancher Mortlock & Woolley

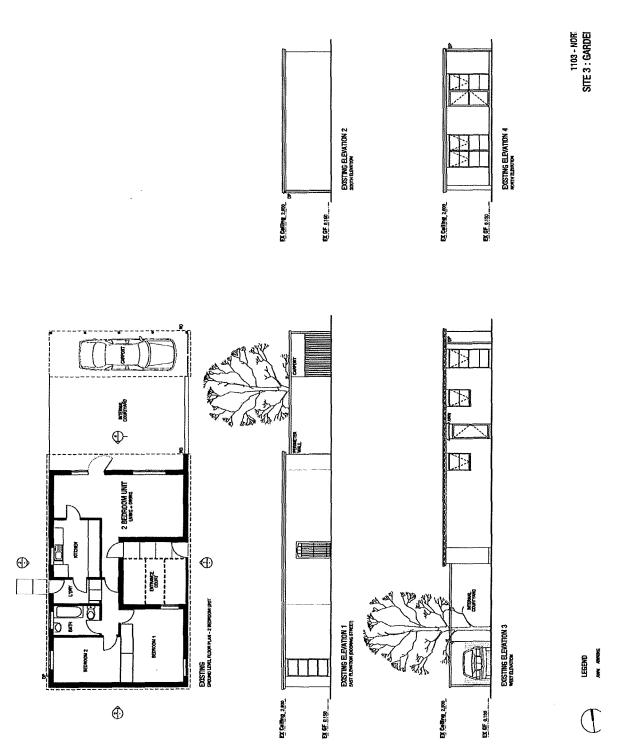


Figure 6.65 Measured drawing of 2 bedroom Garden Flats Source: Ancher Mortlock & Woolley

6.8 Condition and Integrity

An examination of sample files for the Owen Flats and the Bedsitter Flats revealed that most of the maintenance work was generated at tenancy turnover times, interspersed with issues that arose from periodic inspections, accidental damage, vandalism, weather events and normal wear and tear. Most of the periodic replacement focussed on elements such as window and door fittings, glass, plumbing fixtures, kitchen cupboard doors, carpets, ceramic tiles, fly screens and light fittings. Some of the Karuah maisonette buildings have experienced a greater degree of alteration.

It is reasonably apparent from this limited analysis, supported by some site inspections, to conclude that with these exceptions, the buildings of the various dwelling types remained relatively intact in terms of their overall condition and integrity. Nevertheless, there is general evidence of deferred maintenance and minor alterations and additions undertaken by tenants over the years.

6.9 Landscaping Planting Proposal, 1962

A report from the Architects towards the end of the construction process summed up the landscape planting proposals that were finally agreed between the architects and the Parks and Gardens Department.

This report clearly indicates that the architectural and civic presentation of the completed housing project was to be enriched by a well developed and extensive planting programme of mature trees, advanced shrubs, pergolas and vines. This scheme is apparently in marked contrast to the relatively stark presentation of the completed project illustrated in the contemporary photographs by Max Dupain and published in *Architecture in Australia* on March 1965. The progressive growth of the landscaping is apparent from later aerial photos.

Paired Houses

- a) Stormwater channel: Advanced evergreens (20-25 feet) lining south bank and large clump to west on north bank lined with advanced shrubs and chain wire fence.
- b) Northbourne Avenue: Between Paired Houses facing east and at east end of courts, mixture of advanced evergreens (20-25 feet) European Cedar, River Oak, Cypress Pine. Some deciduous (5-8 feet) advanced stock with advanced shrubs (polyanthus, cotoneaster) flanking the houses. Small areas between surface gutters and curved wall filled with gravel and rolled.
- c) Courtyards: Pergolas across east and west ends planted with vines (wisteria or Virginia creeper). A mixture of advanced evergreens (5 feet) and deciduous (5-8 feet) with shrubs in each court.

- d) Cul-de-sacs: Planted with advanced stock deciduous trees (5-8 feet). Small areas between kerb and fences filed with gravel, rolled and planted with advanced shrubs.
- e) De Burgh Street: Plantation strip planted with deciduous trees (5-8 feet) to match west side of the strip. Shade trees (advanced evergreens 5-8 feet) in clumps between curved garden wall and hard standings. Tank surrounds and Garden Depot walls planted with advanced shrubs and vines.

Owen Flats

- a) Northbourne Avenue: Advanced evergreens (5-8 feet) in pergolas between flats
- b) South Boundary: Flanked by line of advanced evergreens (15-20 feet)
- c) De Burgh Crescent: Advanced deciduous trees (5-8 feet) at kerb near rear and front entry paths. Between kerb and west wall of each block advanced shrubs. Drying yards finished with packed gravel. Entry path next Meter Court lined with advanced shrubs.

Karuah Maisonettes

- a) Northbourne Avenue: Front of Maisonettes planted with mixture of advanced evergreens (5-8 feet) and deciduous (5-8 feet) with advanced shrubs, area between blocks with shrubs against wall, area between wall and hard stand packed with river gravel and planted with deciduous trees (5-8 feet)
- b) North boundary: Line of advanced evergreen (5-8 feet) along garden walls.

Garden Flats

- a) Dooring Street and Dooring Crescent: lawns in front of walled housing planted with mixture of advanced evergreens (5 feet and 5-10 feet) also deciduous (5 feet) interspersed with advanced shrubs against garden walls.
- b) Common Court: Planted with advanced shrubs and evergreens (5-10 feet).
- c) North Boundary: Adjoining existing two storey housing between kerb and fence planted with advanced shrubs and evergreens (5-8 feet) (Wattle).
- d) Private entry courts: Filled with 3 inch packed gravel and rolled.

Bed Sitter Flats and Tourist Centre

- a) Tourist Centre: Existing fence on east boundary planted with clumps of wattle (5-10 feet) interspersed with advanced shrubs.
- b) Bed Sitter Flats: Advanced evergreen (20-25 feet) in heavy clump on corner Morphett Street with some deciduous (5-10 feet). Parking areas masked by lines of advanced evergreens (5-10 feet). Some advanced evergreens (20-25 feet) on south side of site adjoining Tourist Centre. Advanced shrubs.

Nature Strip Generally

Loamed, sown and planted by Parks and Gardens to conform to existing planting for Northbourne Avenue. Advanced stock (20-25 feet) is used at north end of the site (both sides of Northbourne Avenue, between Paired Houses to give privacy to commons, and stock 15-20 feet high at south boundary to flats. Elsewhere stock has been reduced to 5-10 feet for economy. All loaming is allowed for by building contractor, and sowing for grass included in Parks and Gardens price. Backyards to Paired Houses, Maisonettes and Garden Flats are also sown but not loamed.

6.10 Subsequent Landscaping, 1979-1980

During the period 1958-1988, the NCDC made great strides in the shaping of the city of Canberra.¹ In 1979-1980, DSB Landscape Architects guided a second stage of landscaping for the Northbourne site. This entailed a continuation of the earlier philosophy that had been adopted, with loosely arranged groups of trees planted in open spaces between the housing groups and along the cul-de-sac leading off De Burgh Street.

This second phase of planting included a range of species types, including a range of oaks (*Quercus spp*), pistachio (*pistacia chinensis*) and ash trees (*Fraxinus oxycarpa* and *F Pennsylvanica*). The oaks in particular thrived, as predicted by Watson and Pryor.²

In his notes, Ken Taylor considers that:

This second group of tree plantings form a backdrop and skyline silhouette above the housing groups linking well with the phase 1 plantings. The whole creates a unified and leafy setting for the dwelling groups and associated spaces in a pleasing civic design outcome.

Taylor, Canberra: City in the Landscape, p.116.

² For a more detailed examination of the evolution of Canberra's landscaping policies, Ken Taylor's Canberra: City in the Landscape should be consulted.

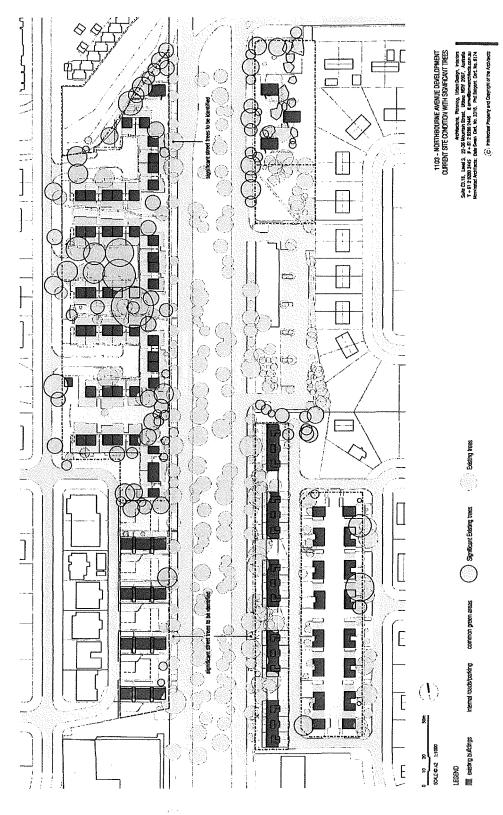


Figure 6.66 Existing site landscaping Source: Ancher Mortlock & Woolley



Figure 6.67 Owen Flats and Paired Houses landscaping



Figure 6.68 Owen Flats and Paired Houses landscaping

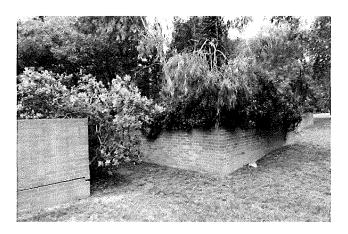


Figure 6.69



Figure 6.70

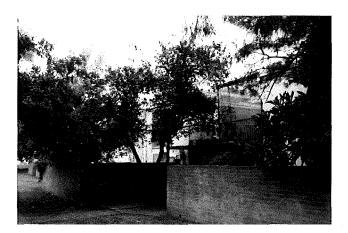


Figure 6.71 Landscaping and garden wall around Paired Houses



Figure 6.72 Landscaping and garden wall around Paired Houses



Figure 6.73 Courtyard walls and landscaping to Paired houses on Northbourne Avenue frontage



Figure 6.74
Relationship of courtyard planting to Northbourne Avenue



Figure 6.75 Some of the major trees are in poor condition



Figure 6.76 Landscaping includes indigenous species that may be self-seeded.



Figure 6.77 Specimen planting from original scheme on Northbourne Avenue frontage



Figure 6.78 Large trees in one of the de Burgh Street parking driveways date from the second phase.



Figure 6.79 Some of the trees in the courtyards are now well developed



Figure 6.80 Street trees in de Burgh Street date from NCDC planting projects



Figure 6.81 Landscaped open channel to the north of the overall site



Figure 6.82 Some trees now dominate the Northbourne Avenue frontage



Figure 6.83 General planting and self-seeded trees near Bedsitter Flats



Figure 6.84 Specimen trees near Garden Flats date from subsequent NCDC planting programmes

Assessment of Heritage Significance

7.0

7.1 Introduction

Heritage, or "cultural" value is a term used to describe an item's value or importance to our current society and is defined as follows in *The Australia ICOMOS Burra Charter*, 1999, published by Australia ICOMOS (Article 1.0):

Cultural significance means aesthetic, historic, scientific or social or spiritual value for past, present or future generations.

The ACT Heritage Act has its own set of significance assessment criteria, which has been used in the analysis set out below.

This section establishes the criteria which are used to understand significance and identifies the reasons for the cultural value of the site and its components.

Significance may be contained within, and demonstrated by, the fabric of an item; its setting and relationship with other items; historical records that allow us to understand it in terms of its contemporary context, and in the response that the item stimulates in those who value it.² The assessment of significance is not static. Significance may increase as more is learnt about the past and as items become rare, endangered or illustrate aspects that achieve a new recognition of importance.

Determining the cultural value is the basis of all planning and analysis for places of historic value. A clear determination of significance guides informed decisions for future planning that will ensure that the expressions of significance are retained and conserved, enhanced or at least minimally impacted upon. A clear understanding of the nature and degree of significance will determine the parameters for, and flexibility of, any future development.

The historical analysis and understanding of the physical evidence provide the context for assessing the significance. These are presented in the preceding sections. An assessment of significance is made by applying standard evaluation criteria to the facts of the item's development and associations.

¹ The Burra Charter: The Australia ICOMOS Charter for Places of Cultural Significance, (1999), p.2.

² ie "social", or community, value

7.2 Established Significance of Northbourne Avenue Housing Group

The following Statement of Significance is contained in the ACT Heritage nomination of the site:

The Northbourne Housing Precinct provides an iconic example of the National Capital Development Commission's earliest moves towards the introduction of modern architectural styles to Canberra. The public housing Precinct of distinctive maisonettes and flats are a rare and well preserved example of late 1950s and early 1960s public housing. They are remarkable for their strategic location on a principal thoroughfare into Canberra. The Precinct is further notable for the intact landscaping surrounding the buildings. The spacious park-like setting is distinctive of the 'modern' style, including expansive areas of grass, specimen trees (mostly exotic) and shrubs and pathways. All combine to produce a precinct of remarkable integrity and representativeness.

The Northbourne Housing Precinct is the only Canberra example of medium density public housing designed by Sydney Ancher, a principal in the practice of Ancher, Mortlock and Murray (&Woolley) and one of Australia's most important specialist designers of residential work.

The Northbourne Housing precinct forms a residential enclave important for its association with the development of public housing in Canberra. It reflects the decision made soon after the Second World War to build a high proportion of medium rise flats. It demonstrates the employment of 'Radburn' planning in the laying out of public housing estates. It also reflects on the Post-War image of 'workers' housing in a park setting', an image that faded as Australia entered the more permissive years of the 1960's and 1970's.

The Precinct represents a high achievement of the ideal of innovative modern architecture and planning –'clean, functional and uncluttered and well sited – in Canberra in the late 1950s. As a design in the Post-War International Style of architecture it has exceptional interest in being the earliest fulfilment of this 'modern' ideal in a public housing project in Canberra.

The Northbourne Housing Precinct embodies the concept of a 'gateway' to the city of Canberra required by the National Capital Development Commission in 1969. Its design and style is sufficiently clear to be capable of demonstrating a planning ideal of that period of Canberra's development.

The place exhibits the principal characteristics of residential architecture in a typical planned neighbourhood of Canberra, viz appropriate human scale, separation of vehicular and pedestrian traffic and movement, functional domestic planning, low cost construction and planning.

The place has been acknowledged for many years as a distinctive example of architecture by professional bodies and has been included in publications about significant architecture.

The place continues to fulfil its original purpose and its planning remains innovative and intellectually sound.

The Northbourne Housing Precinct exhibits creative design and artistic excellence as an entity demonstrating an architectural theme of modern architecture in the Post-war International style, with five variations in the form of five different residential types. Each component is distinctive yet all belong to an outstandingly harmonious and well-scaled ensemble. The work is aesthetically significant for its strongly modelled and simple rectangular design juxtaposed with fine detailing in the International style, all expressed in simple technology.

7.3 Analysis of Cultural Significance

Pursuant to s 10 of the *Heritage Act 2004*, a place or object has heritage significance if it satisfies one or more of the following criteria:

(a) A place which demonstrates a high degree of technical or creative achievement (or both) by showing qualities of innovation, invention or an exceptionally fine level of application of existing techniques or approaches

The Northbourne Housing Precinct demonstrates a high degree of creative achievement in its innovative planning layouts and architectural expression. In both its architectural expression and site planning, the Northbourne Avenue Housing Precinct demonstrates the pinnacle of the Post-War International Modernist style as it was applied to medium density housing developments in mid 20th century Canberra.

The Northbourne Housing Precinct was conceived towards the end of a decade-long programme of extensive medium density subsidised rental housing construction in Canberra, aimed at attracting and catering for large increases in public service staff moving to the city. The recently formed National Capital Development Commission considered the civic design of the site to be critical, given the importance of the site, bordering the main entrance to Canberra from Melbourne and Sydney.

With the possible exception of the planning layouts of the Red Hill Flats in Cygnet Crescent, Red Hill, completed in 1960, the Northbourne Housing Precinct created an innovative and strongly rectilinear composition of buildings and spaces that had not previously been attempted in Canberra. The majority of flat developments in the post-war decades had been arranged around the edges of large rectangular sites, looking out to the surrounding

streets and creating enclosed areas of shared open space. Other groupings such as those at Bega-Allawah-Currong, and further south on Northbourne Avenue, had relied on the repetition of building types to create large quantities of accommodation. At the Northbourne Housing Precinct the combination of five distinctly different building types and siting arrangements, "internal" service roads, networks of pergolas and parthways and the resultant variety of common open spaces, the majority of which directly addressed the major road artery, represents a innovative step forward for large scale medium density housing in the ACT.

The adoption of the Post-War International Modernist cubiform architectural imagery and planning arrangements by Sydney Ancher demonstrated his abilities to transpose leading European architectural and mass housing trends in the inter-war decades into the Australian post war context. Most notable of these examples were Le Corbusier and Max Dubois and their "Dom-ino" housing ideas, particularly as built in Pessac, near Bordeaux in France (1923), and the German mass housing estates (Siedlungen) erected in the late 1920s and early 1930s in cities such as Stuttgart, Frankfurt and Berlin, with their "Bauhaus", "Existenzminimum" and "New Objectivity" inspirations.

Its separation of pedestrian and vehicle movement, using a combination of service roads and drive courts, reflects the Radburn planning philosophies of pre and post-war housing estates in the United Kingdom and United States.

The Northbourne Housing Precinct qualifies for heritage listing under this criterion.

(b) It exhibits outstanding design or aesthetic qualities valued by the community or a cultural group

As a combined entity of five different building types stretching for some 500 metres along this primary entry highway, the Northbourne Housing Precinct demonstrates outstanding design and aesthetic qualities that are valued by the architectural and heritage communities in the ACT and elsewhere.

The consistent architectural expression and arrangement of various building groups created a variety of addresses to Northbourne Avenue that combined to achieve a high standard of urban planning and architectural outcomes. The aesthetic qualities of the overall composition were deliberately complemented by the use of a carefully considered landscaping approach using carefully selected species of mature trees and large areas of grass in the various courtyards.

A significant aspect of the overall planning layout of the housing group was the spaces created between the buildings and fronting Northbourne Avenue. The spaces created a distinct setting for the housing blocks, articulating a spatial pattern that is part of the essential character of the layout. They gave a human scale, and offered opportunity for larger scale tree planting in grassed areas.

The result created a sense of unity, yet variety, and harmony. Without the well-thought use of space between the buildings the scheme would not, from an overall planning perspective, have achieved its distinctive sense of place.

The Northbourne Housing Precinct is included on the Australian Institute of Architects' Register of Significant Twentieth Cenury Architecture and has been classified by the National Trust. It was included on the Register of the National Estate and been nominated for Registration on the ACT Heritage Register.

The Northbourne Housing Precinct qualifies for heritage listing under this criterion.

(c) It is important as evidence of a distinctive way of life, taste, tradition, religion, land use, custom, process, design, or function that is no longer practiced, is in danger of being lost, or is of exceptional interest.

The Northbourne Housing Precinct provides evidence of a distinctive post-war government policy for the provision of subsidised housing in Canberra that is no longer practiced.

The Northbourne Housing Precinct makes an important contribution to an understanding of the development and provision of public housing in post-war Canberra – an important historical theme within the context of the ACT. It also signifies the early and very direct intervention of the newly formed National Capital Development Commission in a massive and urgent campaign to provide accommodation for a huge influx of public servants from Melbourne and Canberra. The Northbourne Housing Group was one of the earliest large scale housing projects (originally conceived as 150 dwellings) adopted by the NCDC to encourage the establishment in Canberra of large scale building contractors who could then deliver the urgently needed housing supply.

Designed originally as part of the provision of subsidised accommodation for the large number of the public servants then being transferred to Canberra, the complex eventually reverted to the standard public housing model of providing accommodation for the disadvantaged. The original model of subsidised housing was discontinued many decades ago as the Canberra residential market matured. Large scale complexes of public or social housing as a distinctive land use are no longer the preferred policy for the ACT.

Within the wide variety of residential buildings erected for public housing in Canberra in the inter-war and post-war decades, they reflect one of the government's response to the need for housing to accommodate the expanding public sector workforce. The buildings and the project generally were planned and constructed to very tight budgets and timeframes, reflecting the then prevailing policy of basing the rental charges on the construction costs. The quality of the internal planning layouts and provision of facilities reflected not only standard government and NCDC policy, but the contribution of the National Council of Women, who commented on these standards for many housing projects in Canberra.

(d) It is highly valued by the community or a cultural group for reasons of strong or special religious, spiritual, cultural, educational or social associations;

The Northbourne Housing Precinct does not have sufficient significance for heritage listing under this criterion.

(e) It is significant to the ACT because of its importance as part of local Aboriginal tradition;

The Northbourne Housing Precinct does not have any identified significance under this criterion.

(f) It is a rare or unique example of its kind or is rare or unique in its comparative intactness

With the possible exception of the planning layouts developed for the Red Hill Housing project that immediately preceded it, the Northbourne Housing Precinct is unique in the public housing flat development projects of post-war Canberra for its highly resolved and consistent application of Post-War International Modernism in its site planning and architectural resolution. It was the only large scale medium density housing project designed by Sydney Ancher, although his firm, with the 1964 inclusion of Ken Woolley, went on to be a major innovator in such housing in Canberra and New South Wales.

In accordance with the design brief and the configuration of the site, the project was the only project of this era to utilise a combination of five building and accommodation types, ranging from single storey garden flats, two storey paired houses, three storey Maisonettes, three storey blocks of flats to four storey bachelor flats. Its arrangement of each accommodation form into a distinctive architectural and planning layout achieved an outcome that had not been attempted previously for the provision of medium density accommodation in the national capital.

The Northbourne Housing Precinct qualifies for heritage listing under this criterion.

(g) It is a notable example of a kind of place or object and demonstrates the main characteristics of that kind;

The Northbourne Housing Precinct is an important example of medium density housing, constructed in the post war environment, and is the only example of such work by modernist architect Sydney Ancher.

The Northbourne Housing Precinct qualifies for heritage listing under this criterion.

(h) It has strong and special associations with a person, group, event, development or cultural phase which played a significant part in local or national history.

The Northbourne Housing Precinct has strong associations with Sydney Ancher (architect) and Sir John Overall (client), both of whom through their respective organisations, created a major public housing project that played a significant part in the development of Canberra in the early 1960s. The combination of Sydney Ancher (Senior Partner in Ancher Mortlock & Murray), a leading exponent of the Post-War International Modernist style in his domestic architecture since 1945, and John Overall, Commissioner of the newly created National Capital Development Commission (NCDC) and other senior staff, achieved a project with a high level of Civic Design and architectural expression.

The Australian Institute of Architects considers that Sydney Ancher was one of the most important Australian architects of the midcentury and a pioneer of the Modern Movement. It is considered that his work 'forged a link between Australian tradition and twentieth century architecture', especially evidenced by the influence his work had in Sydney from 1945 - 1956. Robin Boyd referred to Sydney Ancher's houses as 'in the best Australian tradition of horizontally bleached colours and decorative shadows...a line of development, unaffected, uncomplicated, and an undeviating search for simplicity' (Architecture Australia, 1980). It is these characteristics of Sydney Ancher's house designs that are evident in the design concept for this housing group.

Ancher's reputation as a Post-War International Modernist architect was based on his ability to transpose the essential tenets of major European architects such as Mies van der Rohe and Le Corbusier into an Australian context. His individual houses undertaken prior to this project had demonstrated the possibilities of developing a new architecture specifically suited to Australia. The particular demands of a large scale medium density housing project meant that the lightly expressed, Mies van der Rohe inspired architectural language of his individual houses was not appropriate. Ancher looked back further to his knowledge of Le Corbusier and the German large scale housing projects of the inter-war decades. He produced a unique planning layout containing a unified collection of diverse building types with a strong, cubiform composition, large expanses of flat external walls finished exclusively with pre-coloured textured Tyrolean render, and consistent architectural detailing.

The Northbourne Avenue Housing Precinct was among the first medium density public housing schemes undertaken by the NCDC, as it commenced several decades as the major driving force in the development of Canberra and its consolidation as a National Capital. It provided an opportunity for John Overall and senior Commission staff throughout the design and construction to provide strong guidance on the desired direction and outcomes for the project. The original design brief specifically stipulated a mix of dwelling sizes and called for a high level of Civic Design.

As the Commissioner, John Overall maintained a close watch on the development of the master plan and subsequent sketch designs, often requiring meetings with Sydney Ancher to resolve issues or request additional resolution of design matters. Overall had also been steeped in the International Modernist architecture and planning through his pre-war membership of the Modern Architecture Research Society and post-war involvement with William Holford and other leading planners in the United Kingdom.

Other senior NCDC staff who contributed to the outcome included the Associate Commissioners Grenfell Rudduck and William Andrews, Chief Town Planner Peter Harrison, Executive Architect John Goldsmith, Secretary Manager R B Lansdown, Landscape Architect John Grey, and later in the project Gareth Roberts, who became the NCDC's first Director of Architecture. The Architects were also requested from time to time to discuss the project with Professor Denis Winston, Department of Town and Country Planning at the University of Sydney. Professor Winston was a consultant to the Commission on town planning matters. The Landscaped outcome for the completed project reflected the NCDC's commitment to the overall landscaping character of Canberra. The Department of Interior Parks and Gardens Section was an important contributor, in addition to the NCDC's Chief Landscape Architect, Richard Clough.

As a matter of policy, the NCDC consulted the National Council of Women regarding the functionality of the proposed flats. Their comments lead to a major re-design of what became the single storey Garden Flats. All of these people and organisations made significant contributions not only to the Northbourne Avenue Housing Precinct but to the development of Canberra as the national capital in the post war decades.

The Northbourne Avenue Housing Precinct qualifies for heritage listing under this criterion.

(i) It is significant for understanding the evolution of natural landscapes, including significant geological features, landforms, biota or natural processes;

The Northbourne Housing Precinct does not have any identified significance under this criterion.

(j) It has provided, or is likely to provide, information that will contribute significantly to a wider understanding of the natural or cultural history of the ACT because of its use or potential use as a research site or object, teaching site or object, type locality or benchmark site.

The Northbourne Housing Precinct does not have any identified significance under this criterion.

(k) for a place - it exhibits unusual richness, diversity or significant transitions of flora, fauna or natural landscapes and their elements;

The Northbourne Housing Precinct does not have any identified significance under this criterion.

- (I) for a place it is significant ecological community, habitat or locality for any of the following:
 - (i) the life cycle of native species;
 - (ii) rare, threatened or uncommon species;
 - (iii) species at the limits of their natural range;
 - (iv) distinct occurrences of species.

The Northbourne Housing Precinct does not have any identified significance under this criterion.

7.4 Statement of Significance

The early 1960s Northbourne Housing Precinct, located on opposing sides of Northbourne Avenue in the suburbs of Dickson and Lyneham is of considerable heritage significance. It uniquely represents and is the pinnacle of Post-War International Modernist site planning and architectural design, as applied to medium density public housing development in mid 20th century Canberra.

With the possible exception of the planning layouts of the Red Hill Flats in Cygnet Crescent, completed in 1960, the Northbourne Housing Precinct created an innocative and stongly rectilinear composition of buildings and spaces that had not previously been attempted in Canberra. The majority of recently completed flats in Canberra had been arranged around the edges of large, rectangular sites, excavating central, enclosed areas of shared open space. The Northbourne Housing Precinct was the only project of this era to utilise a combination of five distinctly different building types and siting arrangements, internal service roads, networks of pergolas and common open spaces, the majority of which directly addressed the majory road artery.

The project was conceived at the conclusion of a decade-long programme of extensive medium density subsidised rental housing construction in Canberra, which was aimed at attracting and catering for large increases in public service staff. Given the location on the main entry thoroughfare to Canberra from Sydney and Melbourne, civic design was an important objective identified for the Northbourne Housing Precinct by the National Capital Development Commission (NCDC).

The project has strong associations with Sydney Ancher (architect) and Sir John Overall (client), both of whom through their respective organisations created a major public housing project that played a significant part in the development of Canberra in the early 1960s. The principal architect, Sydney Ancher, was widely recognised as

one of the pioneers and leaders in post-war International Modernist residential architecture in Australia. At the time, the newly formed NCDC sought to employ leading architects from throughout Australia to create for Canberra an identity and individuality worthy of the national capital.

Ancher's reputation as a post-war International Modernist architect was based on his ability to transpose the essential tenets of architects such as Mies van der Rohe and Le Corbusier into an Australian context. The Australian Institute of Architects considers that Sydney Ancher was one of the most important Australian architects of mid 20th century residential development.

Ancher's architectural firm, Ancher Mortlock & Murray, was commissioned by the NCDC, under Sir John Overall, to develop and complete what was to be the first "high density" housing project undertaken by the Commission. Overall and his senior NCDC staff kept a tight rein on all projects as they drove the early development of Post War Canberra towards its status as the national capital. Construction took place in the early 1960s. Sydney Ancher was deeply involved in the conception and design of the project, with Stuart Murray responsible for overseeing the construction. The Northbourne Housing Precinct was Sydney Ancher's largest and most important residential project. It is the only example of his domestic work in Canberra.

The finished project achieved its outstanding creative qualities through an innovative combination of five residential building types utilising consistent architectural imagery, site arrangement, external materials and building scales. It was a combination that had not been attempted previously in Canberra for subsidised housing. Ancher's site planning and architectural design focussed on the use of light coloured cubist forms for group housing, arranged within a landscaped setting. It was an approach that he had seen and studied in the 1930s through the work of Le Corbusier, major building exhibitions in Stuttgart and Berlin and the mass housing estates of the 1920s in several German cities and in Britain.

The Northbourne Housing Precinct provides evidence of a distinctive post war government policy for the provision of subsidised housing in Canberra that is no longer practiced.

The Northbourne Housing Precinct is valued by the Australian Institute of Architects and the National Trust.

7.5 Features Intrinsic to the Heritage Significance of the Place

The features intrinsic to the heritage significance of the Northbourne Avenue Housing Precinct requiring conservation comprise:

- The direct visual and physical relationship of the building groups and the buildings that stretch for some 500 metres along Northbourne Avenue
- The unique combination of five building types and their arrangement in groups and inter-relationships within particular subprecincts of the overall site
- The cohesive and distinctive Post-War International Modernist architectural expression of all buildings across the Precinct, combined with the individual architectural composition of each building type and group
- The original network of pergolas and pathways that originally linked the various buildings and groups into a cohesive Precinct
- The open courts between the groups of Paired Houses, and the Garden Flats that reflect International Modernist medium density residential site planning philosophies
- The early pattern of mature landscaping along the Northbourne Avenue frontages around the Bachelor Flats, between the Maisonette Flats, across the frontage of the courtyards between the Paired Houses, in the vicinity of the Owen Flats and in the northern drainage reserve
- The separation of vehicle and pedestrian movement patterns and the restriction of vehicle parking access driveways to the secondary roads.
- Major trees in the common courtyards, rear streets and culde-sacs planted as part of the original landscaping scheme and subsequent streetscape programmes undertaken by NCDC.

Constraints and Opportunities

8.0

8.1 Context of the Conservation Policy Formulation

The Assessment of Heritage Significance and the identification of Features that are Intrinsic to its Significance, has concluded that the Northbourne Housing Precinct, designed in 1959 by Sydney Ancher and developed by the NCDC, is of considerable heritage significance to the Australian Capital Territory. In this context, conservation of the Precinct is warranted, however conservation can no longer be in the context of its original or current use as subsidised or social housing, the provision of which in terms of contemporary government policy is now delivered in much smaller groups that are more closely integrated with the surrounding residential communities.

The genesis of this project has been grounded in the policy decision by Housing and Community Services ACT to seek a solution that combined respect for the heritage values of the Precinct while increasing its residential capacity for development by the private market. The generation of funds derived from this strategy will enable HCS to provide more appropriate housing accommodation for its clientele across the ACT. Accordingly, the preparation of this Conservation Management Plan and its conservation policies has been done in the context of a real project with well defined objectives, a skilled professional team of architects, landscape architects and heritage consultants and the twin disciplines of statutory ACT Heritage and Planning frameworks.

The Conservation Policies that are set out below have resulted from the rigorous interaction of client, architects and heritage consultants over a period of several months as numerous concepts and development options were tested against a growing understanding of the heritage values of the Precinct and the intrinsic features that expressed that significance. Several consultation sessions were undertaken with ACT Heritage Unit and some members of the ACT Heritage Council, in addition to those various Planning agencies that have an interest in the realisation of the Territory Plan and the Northbourne Avenue Precinct Code as it might apply to this particular site. A Technical Amendment to Precinct Code was requested as a means to facilitate new development in a manner that retained and conserved a large majority of the existing buildings.

Arecent revision of the scheme in March 2013 necessitated changes to some of the policies set out in this Draft CMP. This CMP, while serving as a general document guiding the direction of the project, is under review and will be re-issued as a final document once this change in direction has been appropriately addressed.

Northbourne Avenue, as the major entry axis to Canberra from the north, is now a very different place when compared with its character in the early 1960s. Nevertheless, the civic design contribution of the original scheme is regarded as a worthwhile foundation for the

increase in urban scale and density that is now a key factor in the future of this important corridor.

This section therefore outlines the various major issues and opportunities that need to be taken into account in the preparation of the conservation policies and guidelines for the Northbourne Housing Precinct, in Dickson and Lyneham.

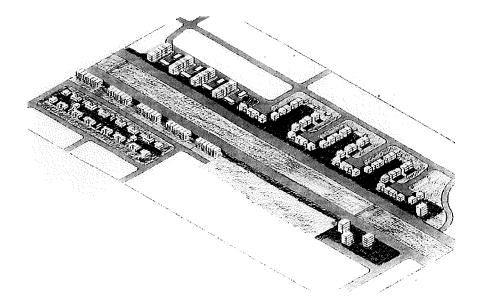
8.2 Conservation of Heritage Significance

8.2.1 Grading of Significant Features

Given the consistency and integrity of the original planning and architectural arrangement, it is reasonable to regard the original planning composition to be highly significant.

Distinctive qualities include the collection of five separate groups of dwellings and their visual relationships to Northbourne Avenue, the interaction of individual buildings or dwellings to the areas of common open space, the principle arrangement of car access from the rear and the layers of mature landscaping schemes that have evolved over time. The interiors of individual buildings are generally of lesser significance given their functional and unadorned status and progressive use over time.

The following sketches, prepared by AMW Architects with Graham Brooks and Associates as part of the design exploration, reinforce the primary importance of the direct and innovative relationships between the architectural groups and their adjacent patterns of open landscaped space as the most important aspects of the overall structure and composition of the Precinct.



8.2.2 Primary Conservation Objective

Given the context of the programme set out above, the overarching conservation objective for the Northbourne Housing Precinct shall be:

Objective 1.1

The heritage significance of the Northbourne Housing Precinct, in Dickson and Lyneham, should be conserved and revitalised in the context of its re-use and development as a larger scale private sector residential complex, one that releases financial resources for the provision of social housing elsewhere in the ACT.

8.2.3 Conservation and Re-use of the Buildings and Layouts

Important conservation objectives arising in response to the assessed heritage significance of the Precinct are set out below.

Objective 2.1

The conservation of the Northbourne Housing Precinct should be undertaken in the context of its on-going use and development as a residential complex and shall include conservation, re-use and revitalisation of its urban planning layout, the Post-War International Modernist style built fabric and its evolved landscape character.

Objective 2.2

Conservation should include, as a minimum, the retention of representative examples of each of the five housing groups and building types to retain an understanding of their siting principles and inter-relationships, architectural values and the contribution to the important gateway image on Northbourne Avenue.

Objective 2.3

Re-use and revitalisation of the retained buildings should include provision for their upgrading to contemporary living standards and accommodation. Upgrading may include combining adjoining dwellings into single accommodation units, adding to the bulk of the original buildings in a manner that respects their original architectural character and upgrades the qualities of private and public outdoor spaces throughout the Precinct.

Objective 2.4

Re-use and revitalisation should include the recapture and extension of the original network of pathways and pergolas that linked the buildings and the groups into a cohesive unity. External courtyards and courtyard walls may be reconfigured.

8.3 ACT Heritage Act

The subject site is identified as a Nominated Place under the ACT Heritage Act. Listing as a Nominated Place on the ACT Heritage Register generates a statutory requirement for the conservation of the recognised heritage values of the place. The ACT Heritage Nomination Dossier includes a preliminary assessment of significance and reference to the standard set of **Heritage Guidelines** that are attached to the majority of heritage places included on the Register.

The Northbourne Housing Precinct has been a Nominated Place for some time, reflecting the on-going liaison between Housing and Community Services ACT and the ACT Heritage Unit in an attempt to identify a reasonable and acceptable outcomes within the expectations of both agencies.

The current project, developed in close coordination between architects, heritage consultants and HCS has identified a combined conservation, re-use and redevelopment direction that appears to respond favourably to this shared objective. Accordingly, ACT Heritage Unit and HCS wish to progress the project. Several primary actions have been identified for the short term:

- The preparation of a more comprehensive heritage assessment than was contained in the Nomination Dossier, to potentially inform the formal Heritage Listing process of the site under the provisions of the ACT Heritage Act
- The preparation of a Conservation Management Plan that provides an overall framework for the future conservation, re-use and redevelopment of the site and which can be submitted for endorsement by the ACT Heritage Council
- The preparation of a preferred conservation, re-use and redevelopment option that tests and illustrates the intent of the Conservation Management Plan and which can be tested against the provisions of the Territory Plan and the Northbourne Avenue Precinct Code.
- The preparation of a Master Plan that illustrates the preferred option, giving confidence to the ACT Heritage Council that the preferred option can be achieved within the overall objective of conserving the heritage significance of the Northbourne Housing Precinct.
- The formulation of site specific Heritage Guidelines that can contribute to the management of future development applications for the Precinct.

As discussed below, the testing of the preferred heritage scheme for the Precinct has identified the need for a variation to the Territory Plan, if it is to maximise its heritage outcomes.

Objective 3.1

The Heritage Assessment undertaken during the preparation of this Conservation Management Plan should be of sufficient quality and integrity that it contributes to the assessment undertaken for the preparation of the full Heritage Listing process that is likely to be initiated by the ACT Heritage Unit.

Objective 3.2

The proposed site specific Heritage Guidelines proposed as part of this CMP should achieve a balance of objectives as to be adopted, in whole or in part, by the ACT Heritage Council for inclusion in a future formal Heritage Listing for the Precinct.

Objective 3.3

The combined conservation, re-use and redevelopment proposal , discussed in the proposed Master Plan, should achieve a sufficient balance between conservation and development objectives to facilitate the future endorsement by the ACT Heritage Council of the overall Conservation Management Plan.

8.4 Housing and Community Services ACT Objectives

These Objectives are discussed in the HCS January 2012 Public Housing Asset Management Strategy 2012 -2017. The following extracts highlight the issues and objectives related to the Northbourne Housing Precinct.

The public housing system in the ACT is for the provision of housing and community services to the most vulnerable members of the Canberra community. These social policy aspects present challenges to the strategic asset management of the public housing portfolio. A contemporary and responsive asset base is necessary to ensure the best social inclusion outcomes are achieved for public housing tenants.

The Public Housing Asset Management Strategy must sit within the overall housing market in the ACT and in this regard Canberra has historically lacked the range and distribution of low cost stock of other metropolitan cities. Whereas previously public housing was used for public servants working in Canberra, now 91% of public housing tenant s are on rental rebates. The ACT has retained a higher proportion of public housing stock than other jurisdictions.

The major responsibilities of the Community Services Directorate in relation to the asset management of the public housing portfolio (include):

• Reducing concentrations of disadvantage through public housing redevelopment to align the portfolio with changing social structures and tenant needs

• Leverage of the asset base through private sector partnerships and use the value of the asset to assist in restructuring the portfolio.

Development of a public housing asset management strategy cannot be considered in isolation, but must be seen in the context of the development of a broader strategy for the expansion of social housing in the ACT in a way which improves the range of housing choices available to ACT residents.

Of the approximately 11,800 public housing dwellings spread across the ACT, some 15% date from the 1950s, while in excess of 80% are even older. The current practice is that old and inappropriate properties that no longer suit the needs of tenants are sold into the private market, with the timing dependent on tenant vacancies or sale to tenants. Planning and heritage constraints can affect both the saleability of properties, as well as revenue received from sales.

Despite the disposal and construction/acquisition programmes, the portfolio continues to age. This places pressures on maximising revenue from the sale of stock, with the need to target properties which deliver high returns from their sale.

The programme of modifying dwellings to suit the needs of tenants, as the tenants grow older, continues. New dwellings are constructed in such a way as to maximise their liveability and adaptability for existing and future tenants. Common features include wider doorways and corridors, hobless showers and no steps to get into the dwellings. In addition to meeting the needs of clients who require such specific accommodation, it improves the flexibility of the public housing portfolio to respond to changing demographics. The portfolio has to respond to changing needs, household structures and growth patterns of the Canberra community, such as the growth in Gungahlin and the Molonglo. In the inner-north and inner-south the Government will continue to redevelop existing areas of high concentrations of unsuitable holdings in some areas and replace them with stock in the redeveloped sites and in the newer suburbs.

Capital expenditure is funded primarily from the proceeds of property sales, with a modest contribution from a small operating surplus. The revenue received from property sales must be sufficient to rejuvenate the stock and at the same time to meet the ACT Government's commitment to maintenance of public housing stock numbers, and address the aspirational target in the Parliamentary with the ACT Greens Party of growth in public housing to 10% of Canberra's total number of dwellings.

The aging portfolio, with its high proportion of Multi Unit Properties (those complexes with more than 40 units), no longer matches the profile and needs of contemporary applicants. This contributes to pockets of disadvantage, high refusal rates and transfer requests.

Of the total housing stock, 22% are flats and of these 83% are locating within Multi Unit Properties such as the Northbourne Flats (Braddon and Turner) and Gowrie Court (Griffith).

While several of the MUPs are in high value locations and are well located near shopping centres and public transport, they can be subject to problems, with many being over 40 years old and requiring high maintenance. They are limited in the types of households they can accommodate and may not comply with current standards or building codes. They are also not the most appropriate locations for clients with high and complex needs, who will often require increased levels of support from community agencies and Housing ACT to sustain tenancies.

Some of the MUP sites under-utilise the land on which they are built, are affected by planning or heritage constraints and are located next to vacant unused blocks of land.

Earlier redevelopments of multi unit sites include McPherson Court (O'Connor), Condamine Street (Turner) and Lachlan Court (Barton). These resulted in improved social and urban design outcomes but returned only 15 to 18% of the original stock numbers (either on site or purchased from sales revenue). More recent developments, including redevelopment of the former Burnie Court and Fraser Court sites have substantially increased the return.

More recent development initiatives include the Currong, Bega and Allawah Apartments. IN November 2011 the Government released a draft variation to the Territory Plan to permit redevelopment of the site. On the site of the Northbourne Flats (in Turner and Braddon) a national design competition for the redevelopment of the site has been finalised. The Government is working with the winning architect on a master plan for the area.

Further north on the avenue, at the Northbourne Precinct (Lyneham and Dickson), the Government is working with the architectural firm Ancher Mortlock Woolley to secure ACT Heritage Council support for the redevelopment of the precinct.

Housing ACT continues to work closely with the ACT Heritage Unit and the ACT Heritage Council to consider future sustainable options and constraints in relation to properties of heritage significance.

The Government has developed a set of asset management principles in response to the challenges outlined above. The principles are based on the assumption that maintaining a viable public housing portfolio is integral to meeting ongoing needs for affordable and appropriate housing for those people in the community unable to access alternative suitable housing options.

Principle 1

The larger concentrations of public housing will be progressively redeveloped ensuring the stock is well located across the city, and in areas with good access to public transport, employment, education and services.

The Government will undertake a rolling programme to dispose of poorly performing Multi Unit Properties, optimising the return of public housing units on the development site and in other developments. The first stage of the programme will include:

- Bega and Allawah Court and Currong Apartments (Braddon and Reid)
- Northbourne Flats (Braddon and Turner)
- The Northbourne Housing Precinct (Dickson and Lyneham)

Between mid 2011 and early 2012, the project team comprising AMW Architects, Ken Woolley, who joined Sydney Ancher as a Director in 1964, Prof Ken Taylor (Landscape Architect) and Graham Brooks and Associates, Heritage Consultants, worked closely with HCS to explore a wide range of issues, constraints and opportunities associated with the potential conservation and redevelopment of the site. The feasibility stage revealed that a substantial proportion of the original dwelling units, including a representative sample of each type and group, could be retained, conserved and incorporated into a redevelopment project. Eventually a development target of up to 80% of the permissible Floor Space Ratio of 2:1 was selected for the combined retention and redevelopment project. This would take account of the implications of heritage objectives while providing an optimum potential financial outcome for the provision of public housing elsewhere in the ACT.

The emerging outcome of the feasibility study for the Northbourne Housing Precinct was discussed with representatives of the ACT Heritage Unit on three occasions during the process.

Objective 4.1

The combined conservation, re-use and redevelopment outcome for the Northbourne Housing Precinct should aim to achieve a total accommodation equivalent of up to 80% of the permissible Floor Space Ratio for the overall site.

Objective 4.2

Potential demolition of selected original buildings should be undertaken in a manner that minimises impacts on the integrity of the retained groups and their distinctive urban patterns.

Objective 4.3

The introduction of new buildings should be carefully integrated into these portions of the sub-precincts considered to be of lesser heritage significance within the entire Northbourne Housing Precinct.

Objective 4.4

The massing and siting of new buildings should reflect the innovative planning and character of the original Sydney Ancher scheme and achieve a new level of innovation in architectural, planning and overall conservation terms.

8.5 ACT Planning Context

The discussion in this section does not attempt a full town planning analysis of the subject site and its development controls. It aims to identify the planning framework that links development consent deliberations with heritage considerations.

The proposed conservation, re-use and redevelopment of the Northbourne Housing Precinct shall be undertaken in the context of the ACT Planning and Development Act 2007, the Territory Plan and the Northbourne Avenue Precinct Code 2010. This suite of policy and regulatory documents sets out a range of mandatory requirements for development along Northbourne Avenue but also establishes high level objectives for the adoption of creative, responsible outcomes for places of heritage significance. The full weight of these requirements will bear on the assessment of future development applications made for the proposals within the Northbourne Housing Precinct.

Preliminary advice received by HCS during the initial consultation period was that some of the proposals contained in the preferred heritage option for the subject site would require a Technical Amendment to The Northbourne Avenue Precinct Code prior to the granting of future development consents.

Section 148 of the *Planning and Development Act 2007* requires that some development applications must be referred to a prescribed entity prior to their determination. Section 26 of the Planning and Development Regulations 2008 identifies the ACT Heritage Council as a prescribed entity for referrals that are being assessed in the "Impact Track" for development consent.

The Northbourne Avenue Precinct Code identifies the relevant zoning of the two subject sites, in Lyneham and Dickson, as CZ 5, Residential Mixed Use.

The Code also notes the following:

- Proposals in the Impact Track have the option to comply with the rules or criteria, unless the rule is mandatory.
- Proposals in the Impact Track also have the option to justify any non-compliance with the rules and the criteria, unless the rule is mandatory. Where it is proposed to not meet the rules and the criteria, the onus is on the applicant to justify the non-compliance by demonstrating that the proposed development is consistent with the relevant principles of the Statement of Strategic Directions.

The Intent of Element 6, Environment, of the Code is:

To identify and mitigate potential onsite and offsite environmental impacts of development and incorporate alternative design options where necessary.

Rule 61 under Section 6.2, Heritage of the Code states:

In accordance with section 1487 of the Planning and Development Act 2007, applications for development on land or buildings subject to interim of full heritage registration are to be accompanied by advice from the Heritage Council stating that the development meets the requirements of the Heritage Act 2004.

Criteria 61 of the Code clarifies this rule:

If advice from the Heritage Council is required, but not provided, then the application will be referred to the Heritage Council in accordance with the requirements of the Planning and Development Act 2007.

This rule clearly places great importance on the need to achieve a well founded and balanced heritage outcome for any project involving a heritage listed place. It requires the Heritage Council to confirm its agreement that the proposed outcome is satisfactory in heritage terms. It implies that consent cannot be granted if, in the opinion of the Heritage Council, the proposal will have an unacceptable adverse impact on the heritage significance of the place.

The Statement of Strategic Directions referred to in the Code references heritage issues in several places.

Clause 1.25

Heritage and cultural values will be safeguarded... The distinctive qualities of residential areas and other places, as well as elements of community heritage will also be recognised and their conservation promoted.

Clause 1.26

Identified places of heritage significance will be protected in accordance with requirements for the conservation contained in the Heritage Register and any relevant heritage guidelines under the Heritage Act 2004.

Clause 2.14

Policies and procedures to promote high quality, creative design of development, urban spaces and landscape settings will be applied throughout the Territory, and innovation encouraged, in keeping with the spirit of the National Capital as an exemplar of best practice. Particular care will be taken to ensure high-amenity, quality design outcomes within residential areas, heritage areas, major centres and activity nodes and along principal approach routes. The relationship between the public and private realms will also be emphasised in terms of the design quality of precincts and share spaces, including spaces around buildings, as well as that of individual developments.

This suite of objectives reinforces the original 1959 NCDC requirement that the Northbourne Housing project achieve high quality and innovative civic design, planning and architectural outcomes. It suggests that there should be some discretion exercised by the relevant agencies in their eventual consideration of a scheme on such an important heritage site as the Northbourne Housing Precinct, with its direct relationship to a principle approach route into Canberra.

A Technical Amendment to the Northbourne Avenue Precinct Code was submitted in mid 2012. It sought reduced setbacks from the secondary streets on the western side of the Precinct. It also sought clarification of setbacks in the vicinity of the north-east section of the Precinct.

Objective 5.1

The combined conservation, re-use and redevelopment outcome for the Northbourne Housing Precinct should aim to meet the requirements of the Heritage Act 2004 such that some flexibility in the application of mandatory controls can be achieved through the relevant statutory mechanisms.

8.6 Physical Condition

The general physical condition of the various buildings and other features of the site can be described as fair to reasonable. The condition of external elements such as fences and garden walls is considerably less, with more evidence of deterioration and in places cracking caused by uncontrolled growth of adjacent trees.

There has been a continuing programme of maintenance and repair undertaken across the Precinct for most of its service life since the early 1960s. The majority of this work has taken place between the time one tenant vacated and another took occupancy, interspersed with issues that arose from periodic inspections, accidental damage, vandalism, weather events and normal wear and tear. Most of the periodic replacement focussed on elements such as window and door fittings, glass, plumbing fixtures, kitchen cupboard doors, carpets, ceramic tiles, fly screens and light fittings.

Irrespective of their general condition, the general presentation of many of the dwellings is poor, with personal belongings of tenants in many of the units stored on verandahs or in courtyards, installation of poor quality shade devices or the general lack of personal maintenance for items such as window dressings.

Objective 6.1

Conservation of the retained buildings and site features should include necessary repairs to decayed or damaged building fabric.

Objective 6.2

An outcome of the overall project should be the identification and long term implementation of a cyclical maintenance programme for both new and conserved buildings and site features.

8.7 Upgrading to Contemporary Housing Standards

The original NCDC brief for the project stipulated that the dwellings be designed to the very strict housing standards that applied to all public housing projects in post-war Canberra. These standards were situated at the very minimum considered necessary to achieve a reasonable life style for a variety of tenants, ranging from single people to families. They also reflected the severe shortages in building materials during the constrained economic situation in Australia in the years following World War Two.

As a result these spatial and fit-out standards of the existing units are considerably below contemporary expectations, in either the public or private residential context. It will be necessary to upgrade virtually all of the dwelling units if they are to form an attractive and marketable component of the overall development outcome for the Precinct.

Objective 7.1

Conservation and re-use of the existing building stock should include an upgrading of both spatial and fit-out standards to reflect contemporary expectations.

Objective 7.2

Upgrading of the existing building stock to contemporary living standards should be undertaken in a manner that respects the external architectural integrity of the buildings.

Objective 7.3

Upgrading of the existing buildings may include joining adjacent flats to provide contemporary accommodation standards, or the provision of new accommodation on the rear of each building, designed to respect their architectural character.

8.8 Landscaping and Public/Private Open Space

An analysis of the existing landscaping by Professor Ken Taylor has identified a number of categories that can form the basis for future planning, development and landscape conservation. These include:

- Trees dating from the original 1962 planting scheme, primarily along the Northbourne Avenue frontages, which remain in relatively good condition and should be retained.
- Trees dating from the original 1962 planting scheme that are in poor condition and should be either removed or replaced.
- Trees dating from subsequent NCDC planting programmes that supplemented the original and improved the general amenity of the overall precinct and that of surrounding streets.

- Trees and shrubs that have apparently been planted by tenants and which do not bear a relationship to the original planting scheme, obscure important vistas into the precinct, or are causing damage to garden walls and other features due to their uncontrolled growth.
- Trees and shrubs that are apparently self-seeded and/or belong to species which are inappropriate to the location due to their aggressive environmental impacts.

Objective 8.1

Trees that survive from the original planting scheme along Northbourne Ave, and which are in good condition, should be retained wherever possible.

Objective 8.2

Trees that have not survived from the original planting scheme or which are in poor condition, should be replaced where appropriate with similar species.

Objective 8.3

Trees and shrubs which do not complement the original architectural and planning scheme and/or the subsequent introduction of private open spaces, which are actively damaging structures, or which are not appropriate species for the location, should be removed.

Objective 8.4

Wherever feasible and reasonable, the introduction future new accommodation should be located to avoid the removal of substantial trees that contribute to the overall character of the precinct and surrounding streets.

Objective 8.5

A new, comprehensive landscape plan for the Precinct should be developed and implemented, one that respects the original landscape setting of the buildings, while reflecting the evolution of the landscape over time.

8.9 Potential Locations for New Development

Over a period of several months, a rigorous assessment of the potential to yield additional residential accommodation across the precinct was undertaken against the objective to retain the vast majority of the existing buildings, their civic presence to Northbourne Avenue, their Post-War International Modernist architectural expression and in particular the planning relationships of the five separate groups of buildings in their landscaped settings. The primary objective of this exercise was to recognise and protect, as far as possible, the features of the Northbourne Housing Precinct that are regarded as being intrinsic to its assessed heritage significance.

This interactive and iterative process between the architects and heritage consultants ensured that conservation, re-use and redevelopment objectives were examined and opportunities tested through a large number of options and alternatives. As each threshold of opportunity was reached, additional criteria and depths of assessment were applied to ensure that the potential outcomes could reach the desired objective of civic design, planning, architectural quality, landscaping, amenity and pedestrian circulation compared to the original scheme. A key consideration was to retain, wherever possible, the direct relationship between the Ancher buildings and Northbourne Avenue, with potential new, larger buildings set back behind the older, smaller scale buildings. This model was found to be most successful in relation to the important Paired Houses and Maisonette groups and reasonably successful with the small Bachelor Flats building at the north east corner of the precinct. It was not possible to achieve this model with the Owen Flats group.

The following discussion identifies the five major sections of the overall Precinct that came to be regarded as capable of redevelopment.

De Burgh Street Frontage

The retention of the open landscaped courts between the groups of Paired Houses, and the way they opened out to Northbourne Avenue was regarded as a primary objective. No new development was to be permitted that would weaken this important civic design and modernist planning arrangement. However, the space on the De Burgh Street frontage formed by the original garden walls that enclosed these courts was identified as a potential location for new development.

The original arrangement of the Paired Houses had added an additional house at the western end of five of the six return groups, creating an anomaly that may have been generated by the need to meet the original housing numbers. It was considered that these last five houses could be removed without adversely affecting the primary grouping pattern of four Paired Houses linked by adjoining carports. The free standing gardener's building would also need to be demolished. Carefully developed design guidelines will require a level of transparency and outlook from the rear of the common courts at ground floor through any new buildings in this location.

Paired House Cul-de Sacs

The cul-de-sac driveways that provide access to the carports associated with each of the Paired Houses were considered to be of lesser significance than the common landscaped courts in terms of the original realisation of a distinctive reflection of the International Modernism style of planning layout. This was particularly so in the way Sydney Ancher drew on the principles developed by Le Corbusier and practiced widely in the German mass public housing estates of the 1920s.

The separation of vehicle and pedestrian movement inherent in the layout of the Paired Houses, which reflected the Radburn Estate Planning Principles, would necessarily be replaced by the introduction of underground parking for the considerable increase in on-site residential accommodation. The potential loss of a number of mature trees within these cul-de-sacs is regrettable but impacts more on the current character than it does on the significance of the early planting schemes.

Owen Flats Precinct

The Owen Flats currently provide the lowest standard of contemporary housing accommodation in the overall precinct. To upgrade them requires extensive new accommodation added to their rear elevation, generating the greatest degree of intervention and the greatest degree of impact on the external integrity of the existing building buildings.

Unlike the remainder of the building types on the overall Precinct, the Owen Flats utilised a model that was reasonably well established in post war architecture, particularly in Melbourne.

The original planning layout of the four Owen Flats buildings at the southern end of the Precinct was the least innovative and the one aspect of the overall scheme that was most closely related to the planning directions of earlier Flats developments in post-war Canberra, most notably Gowrie Court in Narrabundah. All four buildings are aligned to face north to maximise sun orientation. They achieved their site coverage of the narrow lot, through very small setbacks from both Northbourne Avenue and the rear service road. The spaces between the individual buildings are filled with carports and driveways, while the southernmost building is located relatively close to the southern boundary.

The introduction of new development between the existing buildings within this precinct would generate a high degree of conflict with the existing planning composition and amenity and a very low outcome in terms of new accommodation. Partial demolition to create a reasonable development area was considered justifiable. Nevertheless it was regarded as important to retain a representative example of the Owen Flats.

Retention of the northernmost Owen Flat building would provide an opportunity to retain the original relationship with the Paired Houses and frame the group of mature trees in the common open space between the two groups that was identified as worthy of retention. This approach also provides a useful transition in scale between potentially higher new buildings to the south and the two storey Paired Houses group to the north.

Karuah Maisonettes and Garden Flats

The five blocks of Karuah Maisonettes create the second of the most distinctive presentations to Northbourne Avenue after the Paired Houses and were an innovative form of medium density housing at the time. They reflected the traditional terraced or row house model of 19th century English and Australian cities. They are set quite close to the Northbourne Avenue frontage but are sufficiently spaced to enable a new development located behind to reach forward and create a combined identity, similar to that which is possible with the Paired Houses on the western side of the Avenue.

The Garden Flats behind are separated from the Maisonettes by a service road and generous setback. They recaptured the common courtyard model of International Modernist large scale housing in pre-war Germany and the earlier Canberra Flat developments, but complemented this with individual private courtyards for enhanced living amenity. Nevertheless it was considered that the space behind the Maisonettes, when combined with the redevelopment of part of the adjacent row of Garden Flats could provide a useful development site that integrated the two adjoining original building groups into a combined new model. This option protects the full integrity of the Maisonettes as well as the key external composition of the Garden Flats, their common central courtyard and frontage to three of the four surrounding streets.

Bedsitter Flats

The most important aspect of the original inclusion of the four storey Bachelor Flats at the northern end of the overall Precinct was to enhance the civic design qualities of the new housing by the introduction of taller buildings on either side of Northbourne Avenue. It is important therefore to retain at least one of these buildings on either side of the main Avenue.

The single Bachelor Flats building on the western side is located in a small triangle of land formed by the adjoining drainage channel. There is no space around this building that is suitable for new large scale accommodation. The three blocks on the eastern side occupy a large parcel of land that adjoins a second parcel of undeveloped land immediately north of the Tourist centre. An early option to retain two of the three Bachelor Flat buildings quarantined a relatively large portion of the overall site area in this quadrant of the Precinct. A revised option retains the northernmost building with its civic design expression while releasing a larger site area for redevelopment.

Objective 9.1

The introduction of increased housing density should be undertaken in a manner that respects and reinforces the overall composition of site planning, architectural forms and the five established urban patterns of the existing development, while continuing the Precinct's role as a "gateway" on Northbourne Avenue.

Objective 9.2

If additional site area is required for the development of the required additional residential floor space demolition of existing buildings should be minimised, be generally limited to features of lesser significance and be confined to locations that generate the most efficient additional space.

Objective 9.3

Areas for the location of new accommodation could include:

- the driveway cul-de-sacs of the Paired House groups and along the De Burgh Street frontage and at the rear of the common courts to these houses,
- the area occupied by the three southernmost of the Owen Flats,
- · along the alignment of the western row of Garden Flats
- over the common service road behind the Karuah Maisonettes,
- to the south and behind the northernmost of the Bedsitter Flats.

Objective 9.4

No new buildings or development should take place in the small area of land in Lyneham where the Precinct extends north across the drainage channel.

Objective 9.5

At least one of the original four storey Bedsitter Flats on each side of Northbourne Avenue at the northern end of the Precinct should be retained and refurbished as a reflection of the original civic design and "gateway" intent of the project.

Objective 9.6

The majority of the two storey Paired Houses, on the western side of Northbourne Avenue, should be retained and upgraded, in particular by retaining the important imagery of the common landscaped common areas that opened out onto Northbourne Avenue.

Objective 9.7

All five of the three storey Karuah Maisonette Buildings on the eastern side of Northbourne Avenue, at the southern end of the Precinct, should be retained and upgraded.

Objective 9.8

The whole of the eastern row of Garden Flats, and those at each end of the group, on the eastern side of Northbourne Avenue, at the southern end of the Precinct, should be retained and upgraded. The common open space running north-south between the two rows should also be retained.

Objective 9.9

At least the northernmost of the four, three storey Owen Flats on the western side of Northbourne Avenue, should be retained and upgraded.

Objective 9.10

New residential buildings should not obscure the traditional visibility and presence of the existing buildings on Northbourne Ave.

Objective 9.11

New residential buildings should be integrated into an overall pattern of pedestrian movement throughout the Precinct

Objective 9.12

New residential development within the overall Precinct may be of up to eight storeys provided it is integrated into the current planning layouts in a manner that respects those layouts and the integrity of the retained housing.

Objective 9.13

The architectural expression of new residential buildings should reflect the cubiform nature and presentation of the original buildings.

Objective 9.14

Parking for the redeveloped Precinct should generally be located underground and accessed from site or rear streets.

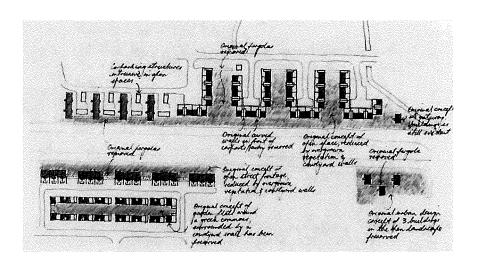
Objective 9.15

The majority of the interpretation of the heritage significance of the Northbourne Housing Precinct shall be achieved through the retention of the majority of the original buildings and housing layouts.

Nevertheless it is important to present and interpret their historical importance in the development of Postwar Canberra.

Objective 9.16

In conjunction with the future conservation and redevelopment of the Northbourne Avenue Housing Precinct an Interpretation Programme should be prepared for display in the nearby Visitors Information Centre and located around the Precinct.



Conservation Policies

9.0

9.1 Introduction

Conservation can be regarded as the management of change. It seeks to safeguard that which is important in the built environment within a process of change and development. As such, it is one of the functions of this document to establish policies and recommendations for the conservation, re-use and redevelopment of the Northbourne Housing Precinct in a manner that protects and enhances its heritage values. In this way, Housing and Community Services will be able to formulate proposals within an established framework of acceptable change. Future development applications can also be considered under the ACT Heritage Act and the ACT Planning and Development Act against an agreed set of heritage objectives, policies and guidelines.

The Conservation Policies set out below have been formulated in relation to the discussion of issues and opportunities contained in Section 8.0 above.

9.2 Principal Conservation Policy Framework

The Principal Conservation Policy Framework for the Northbourne Housing Precinct shall be as follows:

Policy 1.1

The Northbourne Housing Precinct shall be conserved, upgraded and revitalised in a manner that respects its assessed heritage significance, and in accordance with the Heritage Guidelines issued by ACT Heritage Unit.

Policy 1.2

The conservation and revitalisation of the Northbourne Housing Precinct, in Dickson and Lyneham, shall be undertaken in the context of its re-use and development as a larger scale private sector residential complex, one that releases financial resources for the provision of social housing elsewhere in the ACT. It shall be in accordance with the Northbourne Housing Precinct Master Plan and Design Controls.

Policy 1.3

The conservation of the Northbourne Housing Precinct shall be undertaken in the context of its on-going use and development as a residential complex and shall include conservation, re-use and revitalisation of its original urban planning layout, Post-War International Modernist style built fabric and evolved landscape character.

Policy 1.4

Conservation shall include, as a minimum, the retention of representative examples of each of the five housing groups and building types to retain an understanding of their siting principles and inter-relationships, architectural values and the contribution to their important civic design image on Northbourne Avenue.

Policy 1.5

Re-use and revitalisation of the retained buildings shall include provision for their upgrading to contemporary living standards and accommodation. Upgrading may include combining adjoining dwellings into single accommodation units, adding to the bulk of the original buildings in a manner that respects their original architectural character and upgrades the qualities of private and public outdoor spaces throughout the Precinct.

Policy 1.6

Potential demolition of original buildings shall be undertaken in a manner that minimises impacts on the integrity of the retained groups and their distinctive urban patterns.

Policy 1.7

The introduction of new buildings shall focus on those locations and areas considered to be of lesser heritage significance within the entire Northbourne Housing Precinct.

Policy 1.8

The massing and siting of new buildings shall reflect the innovative planning and character of the original Sydney Ancher scheme and achieve a new level of innovation in architectural, planning and overall conservation terms.

9.3 Standardised Conservation Terminology

The Australian ICOMOS Charter for the Conservation of Places of Cultural Significance (known as the Burra Charter) is widely accepted in Australia as the professional methodology by which places of heritage significance are conserved.

Policy 2.1

In order to achieve a consistency in approach and understanding of the conservation methodologies by all those involved in the project, the standardised terminology contained in the Burra Charter shall be adopted:

Place means site, area, land, landscape, building or other work, group of buildings or other works, and may include components, contents, spaces and views.

Cultural significance means aesthetic, historic, scientific, social or spiritual value for past, present or future generations.

Places may have a range of values for different individuals or groups.

Fabric means all the physical material of the place including components, fixtures, contents, and objects.

Conservation means all the processes of looking after a place so to retain its cultural significance.

Maintenance means the continuous protective care of the fabric and setting of a place, and is to be distinguished from repair. Repair involves restoration or reconstruction.

Preservation means maintaining the fabric of a place in its existing state and retarding deterioration.

Restoration means returning the existing fabric of a place to a known earlier state by removing accretions or by reassembling existing components without the introduction of new material.

Reconstruction means returning the place to a known earlier state and is distinguished from restoration by the introduction of new material into the fabric.

Adaptation means modifying a place to suit the existing use or a proposed use.

Use means the functions of a place, as well as the activities and practices that may occur at the place.

Compatible use means a use, which respects the cultural significance of a place. Such a use involves no, or minimal, impact on cultural significance.

Setting means the area around a place, which may include the visual catchment.

Related place means a place that contributes to the cultural significance of another place.

Interpretation means all the ways of presenting the cultural significance of a place.

9.4 Conservation of Significant Fabric and Spaces

Policy 3.1

Conservation of the retained buildings and site features shall include necessary repairs to decayed or damaged significant building fabric.

Policy 3.2

External building fabric from the original construction of the houses, including where subsequent maintenance and repair programmes have effectively replaced like with like, shall be regarded as significant and shall be conserved within the context of the overall project or carefully adapted in a manner that respects the original architectural concept.

Policy 3.3

External building fabric that has been inappropriately or inadequately maintained or repaired shall be replaced or adapted to more closely conform to the original architectural intent. This particularly applies to the obscure glazing panels fitted behind internal block walls that support hand basins in bathrooms.

Policy 3.4

External building fabric that has been added subsequently, often in an informal manner, shall generally be regarded as of no consequence and may be removed or adapted to suit the general refurbishment of the precinct.

Policy 3.5

Internal building fabric in common areas, such as stair handrails, which is significant for its continuity and architectural style, shall be retained and/or adapted as appropriate.

Policy 3.6

Internal building fabric within each dwelling unit is not generally regarded as being of significance and shall be adapted as appropriate to provide contemporary housing standards.

9.5 Upgrading Existing Dwellings

Policy 4.1

Conservation and re-use of the existing building stock shall include an internal upgrading of both spatial and fit-out standards to reflect contemporary expectations.

Policy 4.2

Upgrading of the existing building stock to contemporary living standards shall be undertaken in a manner that respects the external architectural integrity of the buildings.

Policy 4.3

Upgrading of existing dwellings shall generally respect the existing layouts of walls internal walls, some of which are load bearing. It is preferable to combine adjoining room volumes by creating large openings in the common wall rather than by removing all evidence of the former wall.

Policy 4.4

Upgrading of the existing buildings may include combining adjacent flats to provide contemporary accommodation standards, or the provision of new accommodation on the rear of each building, designed to respect their architectural character.

Policy 4.5

The introduction of new internal walls and/or fittings shall avoid interference with existing windows and doors.

Policy 4.6

New internal elements, such as kitchens and bathrooms, should not attempt to replicate the original features. They should be of a contemporary design and character bur remain respectful of the scale and character of the context.

Policy 4.7

The location and visual presentation of new services within the existing buildings shall generally remain subservient and respectful of the scale, understated dignity and presentation of the buildings.

Policy 4.8

Where possible, damage or scarring caused by earlier fit-outs, long term use or service installations shall be repaired to match the original.

Policy 4.9

Where reconstruction or reinstatement is to return an element to an known earlier state, building materials or construction details which are known to be defective shall not be used or adopted.

Policy 4.10

Where required and feasible, existing roofing shall be repaired with similar or closely matching materials to the original.

Policy 4.11

Proposals to upgrade the environmental performance of existing buildings shall take a whole of Precinct approach and be considered for their potential physical and visual impacts on the spatial and architectural integrity of the existing buildings.

9.6 Setting, Landscape and External Features

Policy 5.1

Conservation, re-use and redevelopment of the Precinct shall respect the settings for individual buildings or groups created in the original 1959 housing scheme, particularly in relation to the way they address Northbourne Avenue..

Policy 5.2

Trees from the original planting scheme along Northbourne Ave that survive in good condition, shall be retained wherever possible. **Policy 5.3**

Trees that have not survived from the original planting scheme, or which are in poor condition, shall be replaced where appropriate with similar species.

Policy 5.4

Trees and shrubs which do not complement the original architectural and planning scheme and/or the subsequent introduction of private open spaces, which are actively damaging structures, or which are not appropriate species for the location, shall be removed.

Policy 5.5

Wherever feasible and reasonable, the introduction of new accommodation shall be located to avoid the removal of substantial trees that contribute to the overall character of the precinct and surrounding streets. Removal of the mature trees from the cul-desacs behind the Paired Houses is acceptable only in the context of the residential redevelopment of that portion of the overall Precinct.

Policy 5.6

A new, comprehensive landscape plan for the Precinct shall be developed and implemented, one that respects the original landscape setting of the buildings, while reflecting the evolution of the landscape over time.

Policy 5.7

External garden walls and fences are generally of later design or are in relatively poor condition. They shall be replaced, reconfigured or upgraded as necessary. The screening and enclosure role of garden walls at the western ends of the common courts to the Paired Houses groups and between the Maisonette blocks should be retained or reconfigured as appropriate to the new development.

9.7 Increased Residential Density

Policy 6.1

The combined conservation, re-use and redevelopment outcome for the Northbourne Housing Precinct shall achieve a maximum accommodation equivalent of up to 80% of the permissible Floor Space Ratio for the overall site.

Policy 6.2

The introduction of increased housing density shall be undertaken in a manner that respects and reinforces the overall composition of site planning, architectural forms and the five established urban patterns of the existing development, as outlined in this CMP, the Master Plan and Heritage Guidelines.

Policy 6.3

If additional site area is required for the development of the required additional residential floor space, demolition of existing buildings shall be minimised, be generally limited to features of lesser significance and be confined to locations that generate the most efficient additional space.

Policy 6.4

Areas for the location of new accommodation may include within the driveway cul-de-sacs of the Paired House groups and along the De Burgh Street frontage and at the rear of the common courts to these houses, within the area occupied by the three southernmost of the Owen Flats, along the alignment of the western row of Garden Flats and over the common service road behind the Karuah Maisonettes, and to the south and behind the northernmost of the Bachelor Flats.

Policy 6.5

No new buildings or development shall be located in the small triangular area of land in Lyneham where the Precinct extends north across the drainage channel.

Policy 6.6

At least one of the original four storey Bachelor Flats on each side of Northbourne Avenue at the northern end of the Precinct shall be retained and refurbished as a reflection of the original civic design intent of the Precinct. Demolition of the three southernmost Bachelor Flats buildings on the eastern side of Northbourne Avenue is acceptable only in the context of the residential redevelopment of that portion of the site.

Policy 6.7

The majority of the two storey Paired Houses, on the western side of Northbourne Avenue, shall be retained and upgraded, in particular by retaining the important imagery of the common landscaped common areas that opened out onto Northbourne Avenue. Demolition of the five additional Houses at the western end of the groups, and the free standing garden store, is acceptable only in the context of the residential redevelopment of that portion of the site.

Policy 6.8

All five of the three storey Karuah Maisonette Buildings on the eastern side of Northbourne Avenue, at the southern end of the Precinct, shall be retained and upgraded.

Policy 6.9

The whole of the eastern row of Garden Flats, and those at each end of the group, shall be retained and upgraded. The common open space running north-south between the two rows shall also be retained. Demolition of selected western Garden Flats is acceptable only in the context of the residential redevelopment of that portion of the site.

Policy 6.10

At least the northernmost of the four, three storey Owen Flats on the western side of Northbourne Avenue, shall be retained and upgraded. Demolition of the three southern Owen Flats building is acceptable only in the context of the residential redevelopment of that portion of the site.

Policy 6.11

New residential buildings shall not obscure the traditional visibility and presence of the existing buildings on Northbourne Ave.

Policy 6.12

New residential buildings shall be integrated into an overall pattern of pedestrian movement throughout the Precinct.

Policy 6.13

New residential development within the overall Precinct may be of up to eight storeys provided it is integrated into the current planning layouts in a manner that respects those layouts and the integrity of the retained housing.

Policy 6.14

The architectural expression of new residential buildings shall reflect the cubiform nature and presentation of the original building, and be undertaken in accordance with the Master Plan and Design Controls.

9.8 Massing and Design of New Buildings

Policy 7.1

The massing and design of new residential buildings shall take into account the Heritage Guidelines contained as an Appendix to this CMP, any additional Heritage Guidelines imposed by the ACT Heritage Act, the Master Plan and Design Controls that have been prepared by AMW Architects.

9.9 Carparking and Vehicle Access

Policy 8.1

Parking for both the retained dwellings and new development within the Precinct shall generally be located underground.

Policy 8.2

Access to on-site parking areas shall be from the rear streets. Subject to an agreement with the relevant agencies, direct parking access from Northbourne Avenue shall be very limited and fall within current standards.

9.9 On-site pedestrian movement

Policy 9.1

Re-use and revitalisation of the Precinct shall include the recapture and extension of the original network of pathways and pergolas that linked the buildings and the groups into a cohesive unity.

Policy 9.2

Existing external courtyards and courtyard walls associated with the retained dwellings shall be reconfigured in a manner that respects and complements the original architectural concept for the precinct.

9.10 Colours and Finishes

Policy 10.1

The existing pre-coloured external Tyrolean Render finish to the retained houses shall be retained and repaired as required.

Policy 10.2

The revitalisation of existing dwellings shall take account of the early colour schemes for external joinery and detailing.

Policy 10.3

The external colour schemes for new buildings shall be consistent across the entire Precinct in the same manner as the consistency of the original scheme. Colour palettes should be light in hue and follow guidelines established by the Master Plan and Design Controls.

9,11 Access and Facilities

Policy 11.1

Any changes proposed to the existing buildings to improve access for the disabled shall be integrated as carefully as possible into the architectural character of the buildings.

9.12 Appropriate Skills and Experience

Policy 12.1

The approach to the conservation of the historic building fabric should be based on a respect for the existing significant fabric. Competent direction and oversight should be maintained at all times and any conservation or maintenance work should be undertaken by professionals or tradespeople with appropriate conservation experience and knowledge of post-war residential buildings.

9.13 On-going Maintenance Regime

Policy 13.1

To ensure the on-going conservation of significant building fabric, a regular, fully funded cyclical maintenance regime should be established and implemented. Regular inspections should be carried out and remedial action taken to minimise further deterioration due to the effects of weathering and use.

9.14 Heritage Interpretation

Policy 14.1

In conjunction with the future conservation and redevelopment of the Northbourne Avenue Housing Precinct an Interpretation Strategy and Programme shall be prepared and implemented.

Policy 14.2

A representative photographic recording of the dwelling types and individual buildings within their settings shall be completed before any works commence on site.

Policy 14.3

Consideration shall be given to the retention of one of the dwellings as a display area for the interpretation of the original architectural character and significance of the Precinct as a whole.

9.15 Review of the Conservation Management Plan

Policy 15.1

The Conservation Policies contained in this CMP shall be reviewed every ten years or whenever a future upgrading of the original buildings and landscaping is envisaged.

Policy 15.2

Reviews of the Conservation Policies should be based on The Burra Charter and other relevant guidelines published by the ACT Heritage Council.

Policy 15.3

Reviews shall also take into account any other relevant legislation, planning framework, appropriate literature and widely recognised conservation practices and procedures. They should be undertaken by experienced conservation practitioners in conjunction with relevant ownership and management representatives.

Bibliography

ARCHIVAL SOURCES

10.0

Ancher/Mortlock/Woolley

Northbourne Avenue: Correspondence

Northbourne Avenue: Accounts
Northbourne Avenue: Final Accounts

Northbourne Avenue: Heritage Considerations

New South Wales Land and Property Information

Aerial photograph, Canberra 1959 Aerial photograph, Canberra, 1961 Aerial photograph, Canberra, 1968

National Archives of Australia

National Capital Planning Committee, Minutes and Agenda Papers of Meetings; Volume 1 No 1-26, April 1958 to November 1960, A8839/1895898

Northbourne Avenue housing project – conditions of contract: 1960/742

Northbourne Avenue housing project Part 1: 1959/723 Northbourne Avenue housing project Part 2: 1959/723 Northbourne Avenue housing project Part 3: 1959/723

National Library of Australia

Canberra City District Dickson [cartographic material], National Capital Development Commission [1959], National Library of Australia

National Capital Development Commission

National Capital Development Commission: *First Annual Report for the period 1st March 1958 to 30th June 1958*, Commonwealth Govt Printer, Canberra.

National Capital Development Commission: Second Annual Report for the period 1st July 1958 to 30th June 1959, Commonwealth Govt Printer, Canberra.

National Capital Development Commission: *Third Annual Report for the period 1st July 1959 to 30th June 1960*, Commonwealth Govt Printer, Canberra.

National Capital Development Commission: Fourth Annual Report for the period 1st July 1960 to 30th June 1961, Commonwealth Govt Printer, Canberra.

National Capital Development Commission: *Fifth Annual Report for Year 1961-62*, Commonwealth Govt Printer, Canberra.

National Capital Development Commission: Sixth Annual Report for Year 1962-63, Commonwealth Govt Printer, Canberra.

National Capital Development Commission: Seventh Annual Report for Year 1963-64, Commonwealth Govt Printer, Canberra.

National Capital Development Commission: *Eighth Annual Report for the period 1st July 1964 to 30th June 1965*, Commonwealth Govt Printer, Canberra.

National Capital Development Commission: *Ninth Annual Report for Year 1965-66*, Commonwealth Govt Printer, Canberra

National Capital Development Commission: *Tenth Annual Report for Year 1966-67*, Commonwealth Govt Printer, Canberra

[Senate] Report from the Select Committee appointed to inquire into and report upon the development of Canberra, A.J. Arthur, Commonwealth Government Printer, Canberra, September 1955

PRIMARY SOURCES (-1975)

Beiers, G., Houses of Australia: A Survey of Domestic Architecture, Ure Smith, Sydney, 1948

Boyd, R., Australia's Home: its origins, builders and occupiers, Penguin Books, Ringwood, Vic, 1968

Boyd, R., *The Puzzle of Architecture*, Melbourne University Press, Parkville, 1965, Penguin, Harmondsworth, 1963

Boyd, R., The new architecture, Longmans, Croydon, Vic, 1963

Bunning, W., Homes in the Sun: the past, present and future of Australian housing, W.J. Nesbit, Sydney, 1945

Holford, W., Observations on the future development of Canberra ACT, Government Printer, Canberra, 1957

Holford, W., A review by Lord Holford on the growth of Canberra, 1958-1965 and 1965-1972, National Capital Development Commission, Canberra, 1965

Institute of Architects of New South Wales, Brochure and catalogue of the first International Architectural Exhibition: held by The Institute of Architects of New South Wales 1927, William Brooks & Co., Sydney, 1927

Le Corbusier, *Le Corbusier et Pierre Jeanneret : oeuvre complète 1910-1929 l* publiée par W. Boesiger et O. Stonorov ; introduction et textes par Le Corbusier, Les Editions D'Architecture Erlenbach, Zurich, 1946

National Capital Development Commission, *Canberra: A survey of the residential environment*, The Commission, Canberra, 1975

National Capital Development Commission, *Courtyard Houses*, National Capital Development Commission, Canberra, 1975

National Capital Development Commission, Tomorrow's Canberra! Planning for growth and change, Australian National University Press, Canberra, 1970

National Capital Development Commission, *The Future Canberra*, Angus and Robertson, Canberra, 1965 National Capital Development Commission, *Planning Report of the National Capital Development Commission, covering proposals for the five year period, 1959-1964*, N.C.D.C, Canberra, 1959

Overall, J., Canberra: Yesterday, Today and Tomorrow: a personal memoir, Federal Capital Press of Australia, Fyshwick, 1995

SECONDARY SOURCES (1975-)

Altenburg, K., Canberra: A Landscape History, University of Canberra, November 1993

Ancher Mortlock and Woolley, Ken Woolley and Ancher Mortlock & Woolley: selected and current works, Images Publishing Group, Mulgrave, Vic., 1999

Apperly, R., Irving, R and Reynolds, P., Identifying Australian Architecture, Angus and Robertson, Sydney, 1989

Archer, J., Building a Nation: A history of the Australian House, Collins, Sydney, 1987

Attenbrow, V., Sydney's Aboriginal Past: investigating the archaeological and historical records, UNSW Press, Sydney, 2002

Northbourne Housing Precinct, Canberra DRAFT Conservation Management Plan March 2013 Graham Brooks & Associates Pty Ltd Cantacuzino, S., Wells Coates, a monograph, G. Frazer, London, 1978

Connor, J.R., A Guide to Canberra Buildings, Angus and Robertson in association with the Royal Australian Institute of Architects, Sydney, 1970

Curtis, W.J.R., Modern Architecture Since 1900, (third edition), Phaidon Press Limited, London, 1996

Frampton, K., Modern Architecture: a critical history (fourth edition), Thames & Hudson, London, 2007

Fischer, K.F., Canberra: Myths and Models; Forces at work in the formation of the Australian capital, Institute of Asian Affairs, Hamburg, 1984

Foskett, A., Canberra's Hostels, Houses and Construction Camps: a part of our heritage, A Foskett, Canberra, 1998

Freeland, J.M., Architecture in Australia: A History, Cheshire, Melbourne, 1970

Freeman, P., *The Early Canberra House: Living in Canberra 1911-1933*, The Federal Capital Press of Australia Pty Ltd, Canberra, 1996

Freestone, R., *The Federal Capital of Australia: A Virtual Planning History,* Urban Research Program, Australian National University, Canberra, 1997

Freestone, R., Model Communities: The Garden City Movement in Australia, Nelson, Melbourne, 1989

Gibbney, J., Canberra 1913-1953, Australian Government Publishing Service, Canberra, 1988

Gillespie, L, Aborigines of the Canberra Region, L. Gilespie, Canberra, 1984

Goad, P. and Willis, J.(eds), *The Encyclopedia of Australian Architecture*, Cambridge University Press, Port Melbourne, Victoria, 2012

Greenhalgh, P. (ed), Modernism in Design, Reaktion Books, London, 1990

Greig, A., *The Accommodation of Growth: Canberra's 'Growing Pains' 1945-1955*, Australian National University, Canberra, 1996

Gugler, A., Canberra's construction camps, early houses & selected documents, A. Gulger, Canberra, 2001

Hatherley, O., Militant Modernism, Zero Books, Hants, UK, 2008

Marsden, S., *Urban heritage: the rise and postwar development of Australia's capital city centres*, Australian Heritage Commission, Canberra, 2000

National Capital Authority, *The Griffin Legacy: Canberra, the nation's capital in the 21st century*, National Capital Authority, Canberra, 2004

National Capital Development Commission, Canberra, from limestone plains to garden city: the story of the national capital's landscape (2nd edition), National Capital Development Commission, Canberra, 1986

Proudfoot, P., The Secret Plan of Canberra, University of NSW Press, Kensington NSW, 1994

Reid, P., Canberra Following Griffin: a design history of Australia's national capital, National Archives, Canberra, 2002

Quiring, C., et al. (eds.), Ernst May: 1886-1970, Prestel, Munich, 2011

Riley, T., The International Style: Exhibition 15 and the Museum of Modern Art, Rizzoli International Publications, New York, 1992

Saunders, D., Ancher, Mortlock, Murray, Woolley: Sydney Architects 1946-1976, University of Sydney, Sydney, 1976

Sparke, E., Canberra: 1954-1980, Australian Government Publishing Service, Canberra, 1988

Stephen, A., McNamara, A., Goad, P., *Modernism & Australia: Documents on Art, Design and Architecture 1917-1967*, The Miegunyah Press (Melbourne University Press), Carlton, Vic, 2006

Taylor, J., Australian Architecture since 1960, Law Book Co., Sydney, 1986

Taylor, K., Canberra: City in a Landscape, Halstead Press, Broadway NSW, 2006

Wigmore, L., The Long View: a history of Canberra, Australia's National Capital, FW Cheshire, Melbourne, 1963

Wright, B., Cornerstone of the Capital: A history of public housing in Canberra, ACT Housing, Woden ACT, c.2000

PERIODICALS

Ancher, S., 'Whither Architecture?" in Architecture, 1st June 1936

Ancher, S, " Educating the Architect of Tomorrow," in Architecture, 1 May 1938

Ancher, S., "The Evolution of Modern Architecture" in *Architecture: Journal of the Institute of Architects of NSW*, Vol.38, No.12, 1939

Baldwinson, A.," Medium Density Housing-Some Principles and Projects," in *Australian Planning Institute Journal*, July 1965

Filler, M., The houses that May built," The Australian Financial Review, November 18, 2011

Goad, P, and Willis, J., "Invention from War: a circumstantial modernism for Australian architecture," in *The Journal of Architecture*, 2003

Grounds, R., "Canberra - A Nation's Capital," Building, Lighting Engineering, February 1960

Mar, P.," Home in the Tower Block: High Modernism, Public Housing and Social Memory," in *Social Inequality Today*, Macquarie University, 12 November 2003

Grounds, R., "Canberra - A Nation's Capital" in Building Lighting Engineering, February 1960

Vanlaethem, F., "The difficulte d'etre of the modern heritage," in The Journal of Architecture, 2004

"A Canberra Flat Survey," *Building Lighting Engineering*, March 1960 Building Around Australia, *Building*, *Lighting Engineering*, January 24 1959

"Lachlan Court Flats, Barton, Canberra" Building Lighting Engineering, March 1962

"Lachlan Court, Barton, Canberra," Building, Lighting Engineering, December 1959

"International Interiors and Design" (review), Building, Lighting Engineering, December 1959

Northbourne Housing Precinct, Canberra
DRAFT Conservation Management Plan
March 2013
Graham Brooks & Associates Pty Ltd

- "New Building for Tariff Board" Building, Lighting Engineering April 1960
- "Sulman Medal for 1960" Building, Lighting Engineering September 1961
- "NSW Housing Commission: Acceptance of Higher Density" Building, Lighting Engineering December 1960
- "The Rex at Canberra: New International Hotel," Building, Lighting Engineering March 1961
- "Canberra's Splendour Still a Dream", The Times [London], September 20, 1961
- "The Development of Canberra," Building Lighting Engineering, November 1961
- "Development Committee Plans 458 Flats in Three Blocks," Canberra Times, 28 July 1958
- "Planting of Trees and Hedges", Canberra Times, 8 August 1950
- "Northbourne Avenue" [elm trees], Canberra Times, 6 May 1939
- "Homes in the Sky Review", Architecture Australia, May/June 2007
- "Travelling Scholar Returns: Sydney Ancher's Views on Architectural Education," *Architecture*, 1 March 1936 "House at Gordon," *Architecture*, Jan-March 1952

Cross-Section issues: 1 May 1963, 1 June 1963,1 February 1964,1 June 1964,1 September 1965, 1 January 1966

REPORTS / THESES

Architectural Projects Pty Ltd. Architects, Northbourne Avenue Housing Group Canberra: Conservation Management Plan, prepared for ACT Housing, March 2007

Bogle, M., "Arthur Baldwinson: regional modernism in Sydney 1937-1969", PhD Thesis, School of Architecture and Design, RMIT, 2011

Hanna, B., "Utopia and Dystopia: modernity, public housing and Australian architectural history," M Phil thesis, University of Sydney, 1992

Peter Freeman Pty Ltd, "Bega and Allawah Court Sections 52 and 57 Braddon Preliminary Heritage Assessment and Impact Assessment," June 2009

Philip Leeson Architects, "Allawah and Bega Courts: Sections 52 and 57 Braddon Heritage Assessment and Impact Statement," June 2010

Planning and Land Management Group, "Northbourne Avenue Planning Study," Planning and Land Management Group, Canberra, 1996

MISCELLANEOUS

Heritage (Decision about provisional Registration of Allawah and Bega Courts, Braddon and Reid) Notice 2010 National Capital Development Commission Act 1957-1973 – Sect.11 Functions of Commission

INTERNET

www.adb.anu.edu.au: Australian Dictionary of Biography

www.heritage.nsw.gov.au, State Heritage Inventory

www.sl.nsw.gov.au/picman State Library Pictorial Index

www.Canberrahouse.com.au/; Northbourne Avenue housing group

www.trove.gov.au: Trove