

CANBERRA : POLITICAL DECISIONS, PLANNING AND SUSTAINABLE DEVELOPMENT

Bill Twitchett, France

Short Outline :

Canberra is a young city for which the pulsar effects during development came from a series of political decisions found necessary to overcome negative events that had seriously hampered its evolution. At each phase of the procedure environmental issues were on a high priority. The present paper will trace development during the 20th century, briefly analyse the present situation, then look at prospects for the future of the city within the national and global context.

Introduction

Canberra is of particular interest to the general pulsar theme because of its experience over the past ninety years. There was not a big bang, but a series of phases of concerted development following major interruptions. A country of about five million inhabitants envisaged and then engaged in the establishment of a city of from thirty to fifty thousand inhabitants. It was to be the meeting place for elected representatives of the new far-flung nation and also the centre for the corresponding federal administration of the island-continent.

To the question posed for Session 1 of this Congress : "Planning for pulses and ecologically sustainable development : are they compatible ?" - the answer for the case of Canberra is yes, because of the city's history that we can re-read. It would also seem to be yes for the future, but with serious qualifications related to vital decisions that remain to be taken.

A) A history of sporadic development

Responding to a need : the initial impulse

Following the arrival of a small number of Europeans in Australia towards the end of the 18th century, it was during the 19th century that the development of six separate colonies led to discussion about their unification. Rightly or wrongly it was decided through difficult negotiation that one of the conditions of their coming together would be the foundation of a new city as seat of the new government, hence the initial impulse for the creation of Canberra.

Although all six of the colonies were maritime centres, for trade and for administration of the hinterland, it was decided that the new city should be inland, within the territory of New South Wales and at a minimal distance from centres of the two major colonies located in Sydney and Melbourne. Following study of several possibilities, the site of the capital was chosen, on the western watershed and in the foothills of the Great Divide.

Design competition : the basic options

One of the first tasks of the new government was to define a programme, taking into account the intrinsic qualities of the site and to call for designs through a world-wide competition. The replies were impressive, as witnessed by the archives retained in the National Library and exposed, exceptionally, in 1998.

The winning design (Fig 1) by the Chicago architect Walter Burley Griffin, with his partner Marion Mahoney, took full advantage of a spectacular landscape, combining major ceremonial axes and location of principal buildings with protection of vast natural reserves and integration of dwelling areas into the natural environment.

Environmental considerations were thus inherent in the initial plan, from the macro scale, (with references to the surrounding mountains and hilltops and with a projected lake), to the micro scale (providing for tree-lined avenues and city parks).

A democratic city ? This was apparently one of the founding ideas of the designers and is an important point raised by journalist

Elizabeth Farrelly in a recent article in the Sydney Morning Herald (28th May 2002). One can ask what is democracy in this particular case and what is the significance of this point ? The population was absent, even unknown, during the decision-making of the period, but it cannot be denied that the initial decisions were in fact taken by a legitimate democratically elected government. Were these decisions compromised by members of an over-zealous public service that was in charge? That would seem to be the case at the beginning and the theme is important enough to be taken up again at a later stage of this paper.

Difficulties of foundation

Initial layout began in 1913, to be followed shortly by the overwhelming anti-pulsar effect of the First World War. A foundation stone for the city had been laid, some surveying done and some trees planted. These continued to grow in spite of the war !

With peace another government decision and some public works enabled the opening of a new, though temporary, building to accommodate the House of Representatives and the Senate. During these heroic years, during which the will of the people of Australia far outweighed the reality of the city, the visiting members of parliament were housed mainly in an adjacent hotel, but also had access to the nearby town of Queanbeyan, called upon to give logistic support. Alas, the years of economic depression were about to strike !

During the thirties some further development continued, but without conviction until there began another wartime pause, this time with threat to the Australian territory itself.

So during more than thirty years major functions of the federal government were located in Melbourne while the new city grew modestly. The recent book by Paul Reid (Ref.8) explains how many aspects of the original design had been watered down or completely lost. The situation would seem to be almost desparate if the story were to stop there. But there was resilience in the recurring will of the elected members of government to liberate new energy and to inject this into new, previously unintended, institutions.

Achievements of the NCDC

After 1945 the next positive pulsar effect came from the political will to proceed, becoming manifest, in 1959, in the creation of the National Capital Development Commission with mission to study changing needs and to pilot the future growth of the city. The basic Griffin plan was taken into account, but a whole new approach was considered necessary to cope with a completely new set of needs regarding road and air transport as well as levels of population increase. A unique situation of rights for use of government owned land was a central factor in the choice of strategies.

These included the maintenance of important nature reserves, particularly on the surrounding hills, as well as the concerted development of satellite cities, the conception of which was strongly influenced by the British garden city ideal, so including ecological criteria long before coining of the expression in planning ! The creation of the central lake radically changed the cityscape, then the culminating event was the inauguration of the new Parliament House in 1988 (Ref.7). The population had grown rapidly well beyond the original estimates, but remained modest compared with figures for the state capitals.

How did democracy fare during this period of the city's establishment ? Once again there was relatively little participation by the population that arrived, while directives came from an institution that had been given a mandate by an elected national government. It was a city being established with a specific mission to accomplish for that nation.

Environmental considerations retained high priority during the whole period and were made manifest in the "Y plan" (Fig 2) adopted and largely implemented during that period : housing, public services, infrastructure, bicycle tracks, green spaces... The exploit has been carefully followed in the Annual Reports of the Commission (Ref.5). The 30 years of NCDC responsibility had brought the city beyond a point of no return.

But with analysis in the light of present-day ecological preoccupations and knowledge, one can legitimately ask if all of

these measures are really adapted to Australian conditions for the future.

The overall development during ninety years

The overall experience has been one of irregular development with stops and times of waiting for troubles to pass, rather than that of engaging in a backwards process, before taking up the next phase. The city had not planned for pulses, but had managed to live with several radical negative pulses and to change its orientation to meet new needs and concepts that had been encountered along the way.

B) The present situation

An official coming of age

The short period from 1988 to 2002 has marked the coming of age of Canberra. The ninety year long development has seen the city precariously assume its place in Australia as the seat of central government, but the state capitals still vie for precedence wherever possible, this with considerable success for both Melbourne and Sydney.

One could have imagined that the celebration of one hundred years of federation in 2001 would have been a highly significant event for the city. However it suffered from being overshadowed by the recent Millenium and Olympic Games celebrations in the country particularly in Sydney. Intercity commuting and telecommunications are new factors that are transforming the justification for the city. Until now Canberra has been coaxed into existing through an initial political option and a constantly renewed political will, in spite of major setbacks caused by outside events.

Negative factors, components of the present anti-pulsar period

These negative factors need to be identified and carefully considered

- The absence of an international airport is certainly a hinderance for the city's normal development and global role.
- The region has no official recognition and the relationship with neighbouring Queanbeyan is not clear.
- One encounters lack of conviction about the very need for the city. The present Prime Minister's residence in Sydney, and not in the capital, probably has more symbolic importance than many would admit.
- There are frequent observations made about the cost of federal government - so many public servants and the whole city living on the taxpayer's money ; the cost of infrastructure and monuments - why here and not elsewhere ?
- Knocking Canberra attitudes : is not the city destined to become an inconvenient outer suburb of Sydney ?
- An insufficiently established heart, the central triangle being poorly asserted, with an infrastructure that, as it is, could not cope with densification.

Such commentaries need adequate replies.

Dependance / autonomy : federal government and local democracy

The city people have tended to refuse self-government, but this has now been imposed, with major implications for the planning procedures. The Australian Capital Territory Act of 1988 provided for self-government of the territory, coming into force in 1989.

This act triggered the creation of the National Capital Planning Authority (NCPA) (Ref.6) and also the Australian Capital Territory Planning Authority (ACTPA) (Ref.3). Through the former the Federal Government maintains responsibility for the overall programme for the territory and more particularly for the sites of the specifically federal functions, located mainly in the central areas. The latter institution, dependant on the newly elected territorial government, is expected to assume responsibilities elsewhere, dealing with spontaneous pressures and taking initiatives for the future of the city and its environs.

With the creation of these new institutions the economic and social sustainability of the city would seem to be assured and, in principle, the same level of competence in ecological matters will be maintained. But if the centenary celebrations of 2001 marked the city's coming of age, it has not signalled its maturity. However, the stage is set for "du neuf".

Regional issues

Regional issues are becoming more and more urgent and Canberra has certainly a role to play within the context of the more densely populated south-eastern part of the continent. An interesting initiative has been taken by a group of surrounding local government authorities, working in conjunction with representatives of Commonwealth, State and Territorial governments, in the elaboration of a draft sub-regional planning strategy (Ref.1 & 2 and Fig 3). It becomes evident that Canberra fundamentally needs to escape from its isolation, that the original notion of a one-function city is no longer valid. Also the surrounding towns have expressed their interest in working together.

This trend could go a long way, even get out of hand ! Apart from some areas of Northern Queensland, Canberra and its surroundings now make up the only well-dimensioned region in Australia that could perhaps have the possibility of creating a new regional entity.

Potential ? Who could imagine ?

With the A.C.T. the south-eastern region of New South Wales, according to various definitions, is comprised of an area of approximately 46 500 km², with a present population of about 500 000 inhabitants. It is interesting to have a first-glance comparison with a few other parts of the world. These could include :

- Bavaria 70 548 km² with about 12 million inhabitants
- Belgium 30 500 km² with its 10 million inhabitants
- Netherlands with approximately 41 500 km² and 15 million inhabitants

It would be difficult to convince people in these other parts of the world that the potential for an important increase in population does not exist. But where are the projects ? They are certainly not in the existing big cities of the continent.

Could twinning relationships with comparable situations such as Luxembourg or Brasilia be stimulating so that new initiatives might come to the fore ? This could in fact become a very dynamic region in its own right.

Who decides for the future ?

So now, what is the will of the people ? But which people ? Is it the people of the Commonwealth of Australia, to be expressed through Parliament and the NCPA ? Is it those of the region or simply of the neighbouring town of Queanbeyan ? Is it the Capital Territory with its medium-sized city which until recently has been fundamentally dependant on national decisions ? It is difficult to imagine that the NSW state government would take any major initiatives in favour of Canberra that could question in some way the preponderance of Sydney.

However the international situation is changing. Within Australia, Melbourne had maintained strong advantages over the other coastal cities, so long as the original links with Great Britain, depending on sea transport, prevailed. Sydney's advantages have been considerable due to equivalent links with the USA, facilitated by air travel and reinforced by the natural splendour of the site. But new situations have appeared in the nation's relationships with Asia and the Middle East. Canberra, though seemingly to be at present in a "trough" of the pulsar cycle, is nevertheless the natural geo-political centre for the continent and the South-West Pacific combined, and has been established in a highly defensible semi-mountainous environment.

C) And the future ?

Towards maturity ?

Like the young adult, the reality of the being may not correspond to the plan, however carefully worked out, of the parents, and such can be much to the disarray of the parents ! But we need to relate the specific points of this case to the terms of the Congress, that is to "urban planning and the pulsar effect : coping with peaks, troughs and repeats in the demand cycle".

The continuing anti-pulsar factors

The negative factors mentioned above could take on such importance that the city might witness little change in the future, accepting an attitude of having regrets about Griffin and of becoming that too-far-away suburb of Sydney. No more question of peaks and certainly no preparation for such, by the local population, by the surrounding region, or even imposed by the national government...

Lack of will to take opportunities is already a policy of *laissez-faire*, or even of willful conservatism in order to avoid all sudden changes.

And unexpected pulses ?

Unexpected pulses just might occur. There is already world pressure on Australia to deal with comparative over-production of greenhouse gases and taking this into account could influence the degree of use of car and plane transport. Also, in spite of an already high rate of immigration, there are various pressures to increase present figures.

A threat to the integrity of the Australian territory from any direction could provoke a massive internal migration towards the well-watered south-eastern region, so that the population of Canberra could double, even triple overnight. However cities have absorption capacity and this city has relatively more than others due to its elaborate infrastructure for such a modest level of population. Never has there been so much planning for so few !

Obligations anyway !

Although there may be no surprises, there are already obligations in order to better conform to present knowledge and practices of sustainable development.

Environmental concerns have already brought attention to the over-abundant use of water for a city situated on the western watershed. Large Anglo-Irish gardens are in question and there are moves towards the reintroduction and development of indigenous species. While in the region the generation of electricity from hydro-electric installations is abundant, wind and solar energy have yet to be sufficiently explored. Densification of the urban tissue and priority to improve public transport will become urgent.

Social and cultural issues merit attention because, although the country has a fairly good record of social equality, cultural diversity due to high immigration levels and the presence of indigenous communities could provoke instability.

Economic diversification is important if the city is to overcome its reputation of being a high spender of public resources. A high level of political support is no longer sufficient.

Provoking pulses

Even the Olympic Games - an event par excellence for any city and a theme that has determined the character of this Congress - don't just happen ! They are sought after and won through fierce competition. Such events can be treated as a problem or they can be closely linked with the ambition of an urban community, with the prestige of the city, with the *joie de vivre* of those who take the initiative.

Also, when measuring the relative impact of an exceptional event, it must be related to the size of the city. The present case study is therefore one of modesty, but also of promise for the future and in order to identify future events it is important to relate them to the *raison d'être* of the foundation. The top priority is therefore to confirm the role of Capital for the nation. In order to do this the city

must reply to the criticisms expressed and go beyond these in order to render itself both attractive and outgoing.

- For the central areas we need to go back to Griffin and ask if essential qualities have been lost and if so, decide if this situation merits revision.
- Are communications with the whole of the territory of sufficient quality to facilitate access and is the social structure already in place to welcome new-comers and visitors ?
- Is the city with its dependant territory an exemple for the whole of the national territory in terms of quality of environment and of sustainability ?
- Can a diversified economy be achieved in order to refute criticism of dependance on the nation ?
- Is the city capable of showing leadership in assuring the security of the nation ?
- Is the city ready to help the nation in bringing up to date its constitution

Dealing with any one of such points would be a major event for the city, but the necessary energy can only come from within and the implications for spaces and planning are far from negligible. Should we just wait, or create the adequate pulses ?

Who would dare a scenario ?

Perhaps the folowing is not a scenario, but it is worth sketching some answers to the above questions.

So firstly, about helping the nation in bringing up to date its constitution : yes the city has every interest in keeping this matter before the public eye and even going further in imagining what implications there would be, should changes take place. What impact would there be on the city spaces in order to signify the changes ? Constitution Avenue would take on particular meaning and at its intersection with "Elders (Kings) Ave", "Constitution Hill" could be developed as the place of reference for the Head of State, or for a "Council of Elders" (Fig.5, ref.1). An eastern, non continuous, prolongation of Constitution Avenue would be the place for an

aeronautical museum and observation point, with view onto the flight path of air traffic using the Fairbairn airport. The complementary axes of Sturt avenue and Telopea Park avenue could be rehabilitated.

Can a diversified economy be achieved ? This would seem to be extremely difficult, if not impossible, unless there is a close relationship with the region, going right to an officialisation of a role for Canberra as a regional centre (Fig.4). It is already equipped to do this in terms of level of services to offer in many fields of interest, but it must go further than that by negotiating an agreement with the surrounding local governments (Fig.4) and this would suppose an agreement with the State of New South Wales. It is the solution of this problem that would enable the city to be present with dignity and weight in the affairs of the nation. However this would suppose the recognition of a particular relationship with Queanbeyan, not as "siamise twins" that handicap each other, but as male and female components that will create the new person. This could already be symbolised by the completion of the water axis from Black Mountain, along the Molonglo Valley right to the neighbouring town, marked along the way by suitable installations, such as a wetlands observatory and information centre (Fig.5, ref.6) of national significance. And do we remember the vine-covered walkways and cooling towers in Sevilla ?

Thirdly, the question of communications with the whole of the national territory and the capacity of the city to welcome new-comers and visitors, brings us face to face once again with the regional dilemma and of demographic capacity (Fig 4). Comparable regions in other parts of the world have been referred to above, but any change here would be dependant on the overall Australian reality. Some conservative ecologists affirm that the population should never have gone beyond 15 million. Others affirm that all should be put into place so that the figure should not go beyond 25 million. Compared with other parts of the world it is difficult to argue that a population of about 45 million would not be acceptable and criteria such as defence would seem to confirm this. In the case of a hypothesis of three million inhabitants for the region, one would need to ask immediately

where these people would live. Densification of the existing urbanised areas would account for a considerable proportion, but the surrounding towns would also be concerned : Goulburn, Yass, Cooma... and particularly Braidwood which, being in a coastal river basin would not create a risk of ecological stress to the inland water system. With an increase in population the case in favour of an international airport would be reinforced and possible solutions should be studied very carefully. Were such a project to be linked with the Sydney 2 airport project, then the rapid train link with Sydney could become viable. Melbourne interest, or even priority, in this technology could justify a passage via the difficult terrain to the west, with an underground link across the southern central area of the city. A dissimulated underground station would be located under the sloping site above Old Parliament House. The Sydney-Melbourne dispute would be resolved and animation of the city would be assured. Could heated debate provoke a sufficient pulsar effect to move towards such a future development ?

Then, fourthly, is the city capable of showing leadership in assuring the security of the nation ? Strategically situated in the highlands of the most densely populated part of Australia, such leadership could come from Canberra. There would be implications for naval and air installations (Fig 4), but also for the capacity of the city to commemorate suitably this dimension of national existence and history.

The environmental question, the fifth, implies an ability to adapt, as soon as possible, the existing urban structure to present day preoccupations in this domain. Good solutions for public transport would tend to go with densification, whether this be in the central areas in harmony with the intentions of the original design, or through higher-rise solutions in the centres of the satellite towns, including Queanbeyan. The high priority given to environmental considerations since the first day of the city should facilitate solutions, but there is need to admit that a predominantly urban environment can also be ecologically correct.

A sixth question is what are the Griffin genes worth? (Fig 5) Referring back to 1918 we find a highly seductive plan of infinite axes and a play of form in hexagons, octagons and circles. What are the essentials to be learned from his project ? What were its intrinsic qualities and what do we consider to be its intrinsic value now. Was it just a matter of form or were there qualities that need to be better understood, with implications of symbolic meaning. Applied with adaptations for today's needs, if we build on it, are we confirming our cultural roots, or just quoting from the past as an exercise of post-modernism or even sustaining a caricature of past glory, or of past illusions ? Although there is need for maintaining collective memory through material signs in space and not only through polite mentions in well-meaning reports, what is its interest for the future ?

In fact the Griffin plan covers only a very small part of the overall city but this part covers the two key central areas north and south of the lake. From a practical point of view the central city design has lost two north-south road links. For these, solutions could be found, to the west by a bridge linking the Black Mountain Peninsula to Hopetoun Crescent (Fig.5, ref.3), then to the east by a viaduct extending Sturt Avenue (Fig.5, ref.1). There could also be decisions taken to reinforce some basic Griffin themes where this is still possible : extending an avenue, creating a pole of interest that corresponds to the original layout but which has been compromised. These could include : Ainslie Avenue as a pedestrian Mall (Fig.5, ref 2) ; Jerrabomberra Ave by a planted extension (Fig.5, ref.4); Sydney and Leichardt Avenues by a tree-planted extension into Queanbeyan (Fig.5, ref.5). Some elements have been lost forever, such as the through rail link, but this could be solved by using present tunneling technologies.

The future should not be one of crying about the past : regrets about not having fully implemented the Griffin plan; or regrets about Canberra not being similar to Sydney, to Melbourne, or to Longreach... Yes, the Griffin plan will become an inspiration when the symbolism of the city comes to maturity and this could be exemplified in the central Land Axis (Fig.5, ref.7). Here each addition needs to

have adequate symbolic value, for example : a solar energy museum beyond Melbourne Avenue; a Children's Forum in the Triangle; an Aboriginal Pavillion and Garden on the lakeshore below Anzac Parade; an Aboriginal Stone at the junction with Constitution Avenue; significant elements of a spiritual order on Red Hill and Mount Ainslie; and at the crossing with the Water Axis, an empty space on the shoreline where each person can stand. Free. Commemoration of a national identity, but also of a masterpiece of urban design.

In a nutshell, the next positive pulses for Canberra could be provoked, firstly by internal initiative from the people of the city, with necessary approval from the national authority. Other pulsar events could follow, but would succeed only through tenacious negotiation with the State of New South Wales. External events initiated at a national scale could impose pulses, but in this case the city would logically have the support of the nation in facing up to the implications. Then there could be unexpected events imposed from outside, but where the city could also expect national support.

Examples of those events especificially linked to spatial planning, that the city might have interest in provoking, could be :

- "Constitution Hill", with the radial avenues,
- overall reconsideration of the central areas, of the Griffin avenues and focal points,
- promotion of regional identity and even autonomy, in conjunction with Queanbeyan and the other towns of the region,
- provision for population increase with densification and concerted development of public transport,
- the international airport to be studied urgently with Sydney,
- fast train links with Sydney and Melbourne, with some opening out towards the western regions.

Democracy

The 1989 adjustment to the institutions responsible for governing the city should enable the maintenance of democratic procedures, so welcoming initiatives and avoiding abuse of power.

Thus the ferment of the city will somehow prevail. However it is important to realise that the reforms made so far concern only the territorial and national scales of consideration. We have seen that a healthy, sustainable situation also concerns the regional scale of daily and weekly life of the inhabitants and for this there is confusion because the power base is in Sydney. Here the people of the Canberra region are a minute minority, while the people of the Territory have no say at all. The solution of such a dilemma goes well beyond the possibilities of this Congress, but it is important that the problem should be noted and the implications understood.

Also, opinions have been expressed about the difficulty of combining design and democracy, as though design implies no possibility of democracy or that democracy implies no possibility of design. Similar arguments could be put forward about sustainability ! While it is important to signal the dangers, there should be no question of such an approach becoming doctrine.

There remains the difficulty of difference of time scales between relatively short democratic political mandates and the much longer-term process of ensuring sustainability. The experience of the NCDC was significant in that it was a sufficiently strong institution to ensure continuity, but nothing can replace an enlightened public opinion capable of adapting itself to new requirements. Planning for sustainability implies that what we are doing now, with all of our faults, will have positive value and significance for future generations. We might do what we can, but we can't know what new influences will come. The founders of this city (and even moreso for older cities) could not foresee massive use of cars, the airplane, nor ICT... nor two world wars that would hinder the follow through of the original intentions and transform the needs. The members of each generation are obliged to take it all as it is, without useless recriminations, and to get on with things, if they so wish...

Conclusions

The Congress theme has been shown to be of interest to the fairly particular case of Canberra, to the extent that the final results will merit follow through in the city. One can also hope that the Canberra experience might be pertinent elsewhere, particularly in the case of new cities where specific problems concerning political will and the planning process are to be addressed.

It is important to distinguish between pulses provoked by the local population, to be dealt with by programming for long-term diversified benefits, and pulses imposed from outside, for which solutions will depend on the existence of an adequate planning service, capable of facing up to emergencies.

For young cities, as for the older ones, the key criteria for sustainability need to be written into all projects for development and assumed into public opinion.

What are the hopes of Canberra becoming a "real city" ? This will be determined by the capacity of the local population to "take root" and to take initiatives so as to liberate the development process, in harmony with the particular surroundings. The city itself can build on its considerable achievements, adjusting imported practices to requirements of the natural environment while assuring the transition from a rural ecology to an urban ecology.

Liste of illustrations

- Fig.1 Walter Burley Griffin 1918 plan
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- Fig.3 Sub-Region Planning Committee - Strategy
- Fig.4 Regional research document - W.Twitchett
- Fig.5 Central areas - base map NRMA - "Griffin revisited"

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(Software Word 2000)

Dr. Bill TWITCHETT
Arras, July 2002

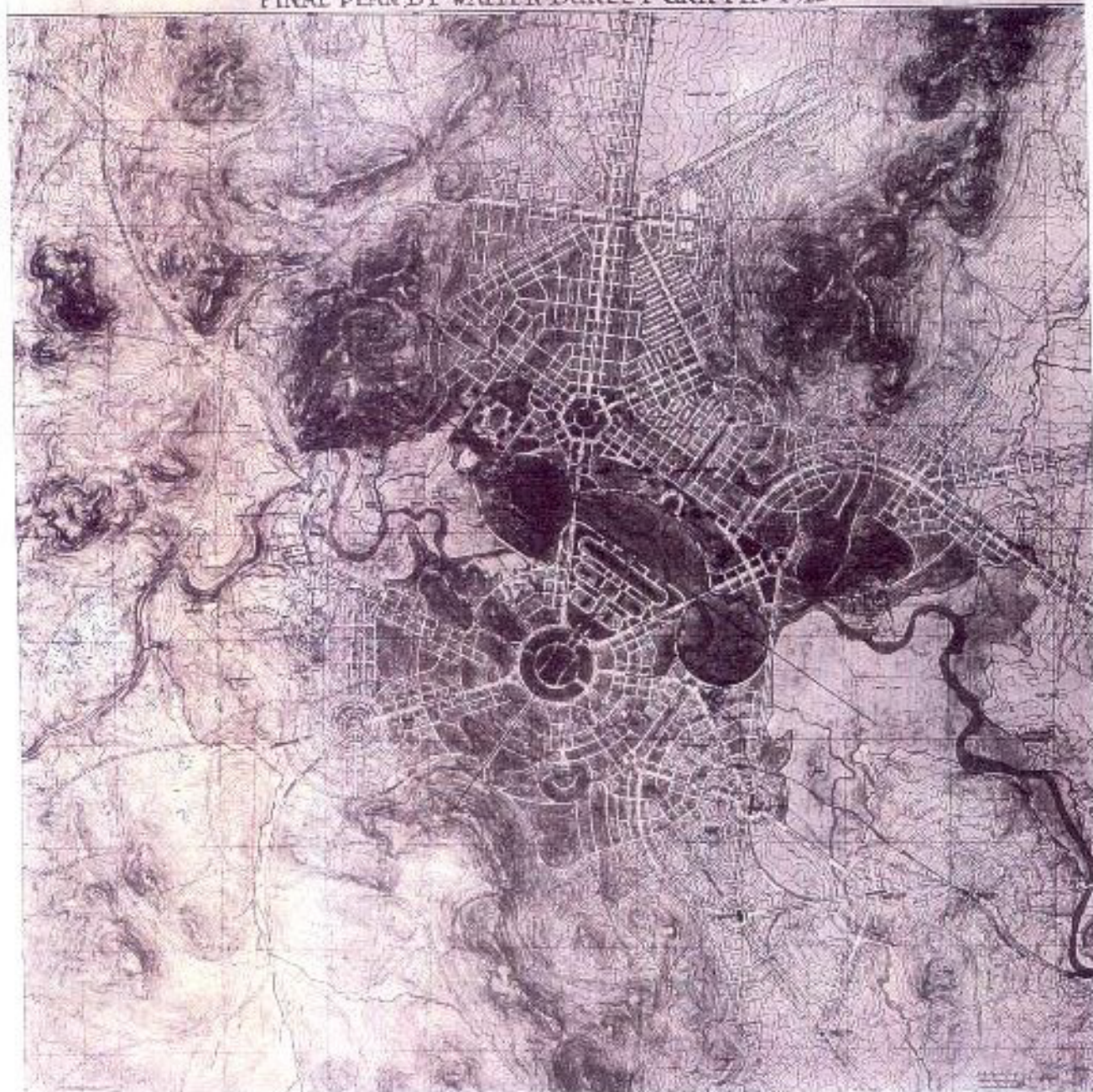
CANBERRA

PLAN OF CITY AND ENVIRONS
SCALE 1:25,000

CONTOURS 5 FT INTERVALS

FINAL PLAN BY WALTER BURLEY GRIFFIN 1918

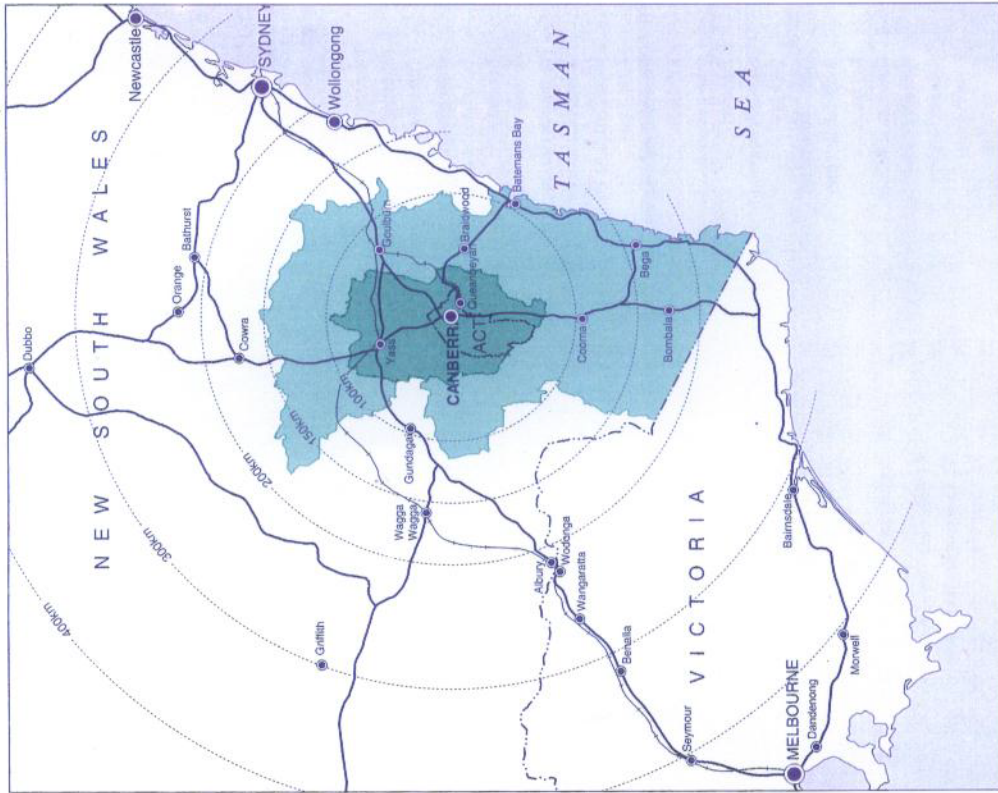
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A diagram illustrating
Canberra's possible future
development to cater for a
population of up to 400,000.

NCDC

WT p.10



ACT & SUB-REGION

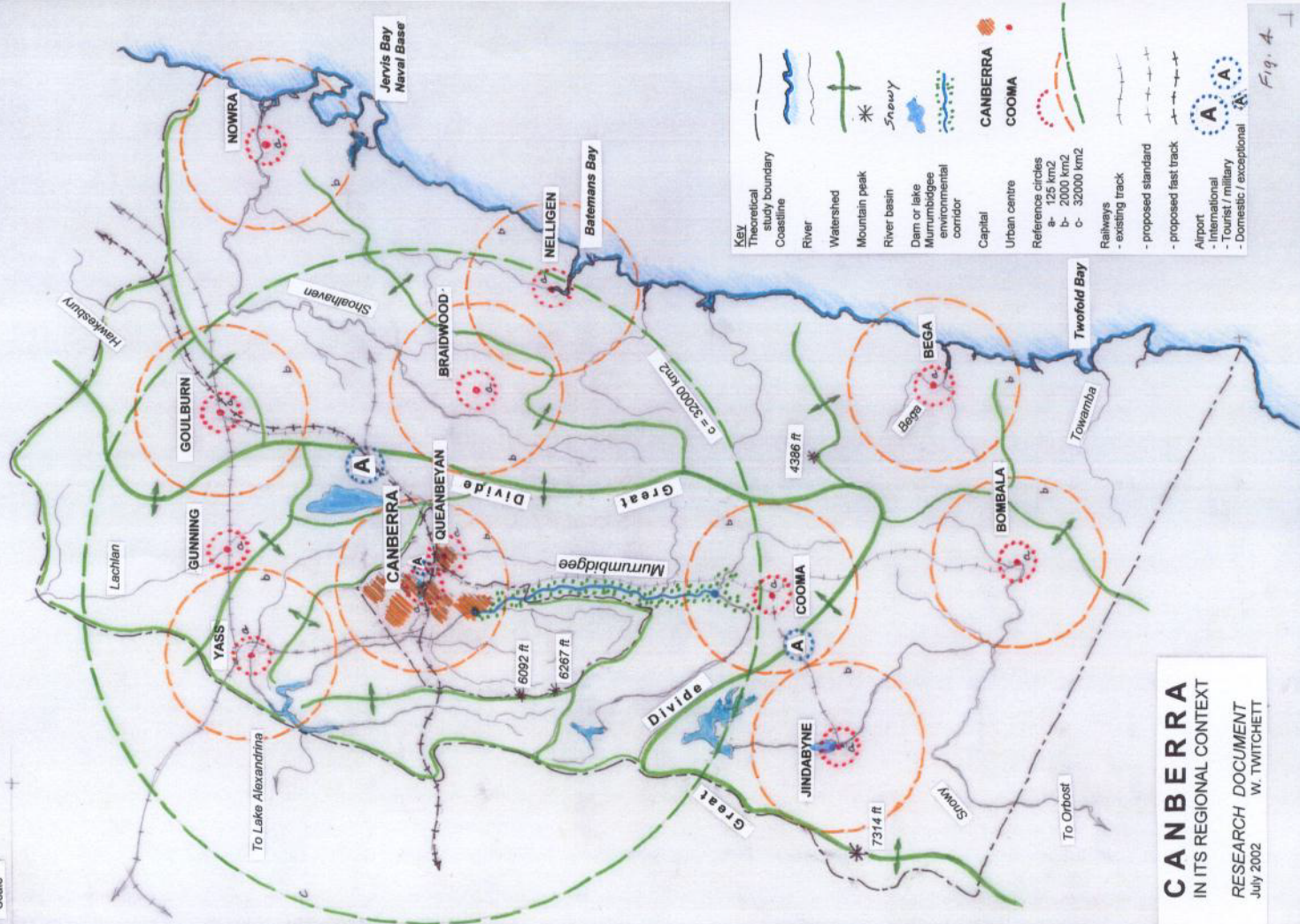
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Figure 1: LOCATION

ACT AND SUB-REGION PLANNING STRATEGY

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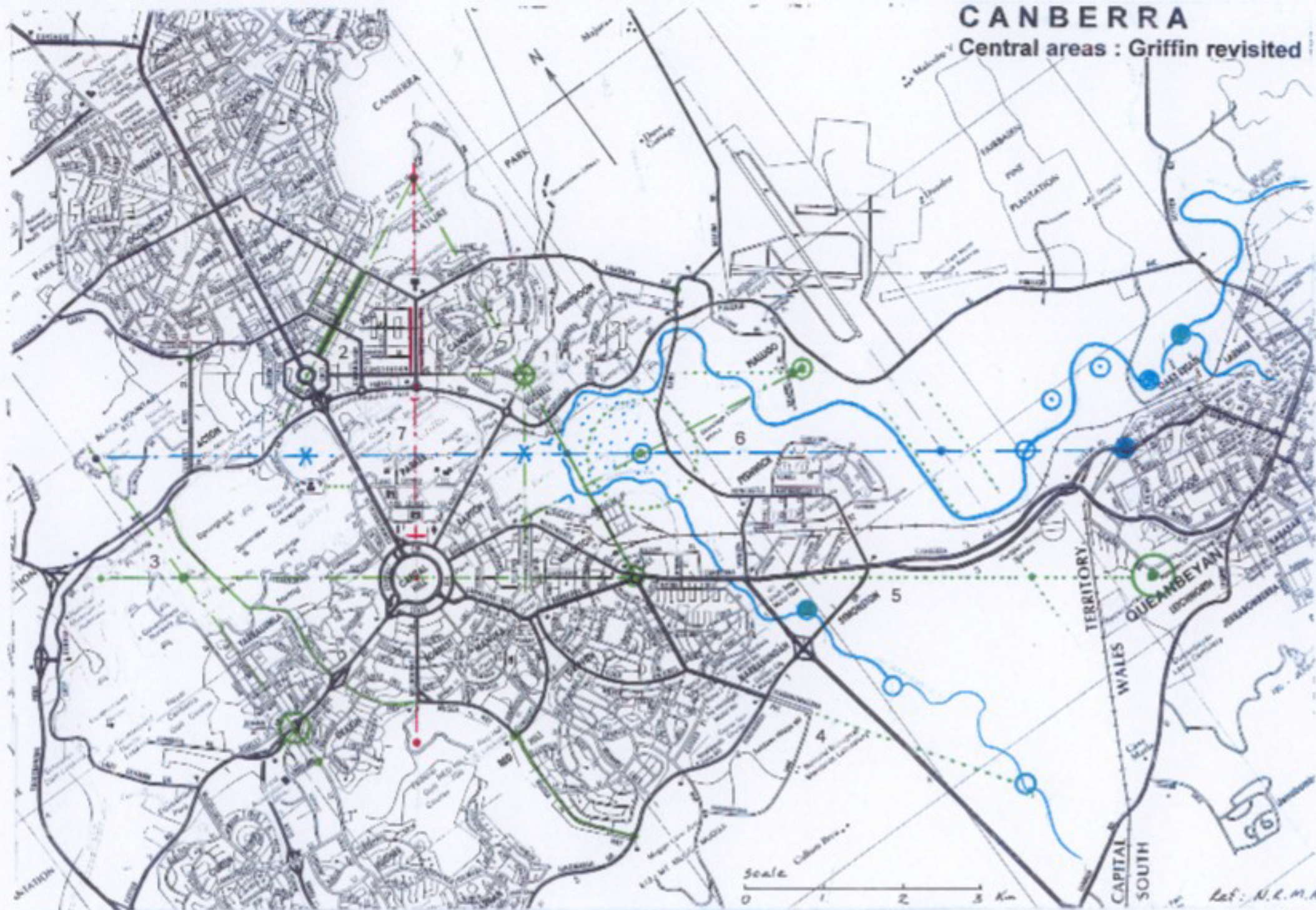
Scale



CANBERRA
IN ITS REGIONAL CONTEXT
RESEARCH DOCUMENT
July 2002
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CANBERRA

Central areas : Griffin revisited



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