



PALMERSTON CITY CENTRE PARKING STRATEGY

February 2015





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'If you plan cities for cars and traffic, you get cars and traffic. If you plan for people and places, you get people and places.'

Fred Kent, Project for Public Spaces

Introduction

The Northern Territory Planning Scheme requires the provision of sufficient off-street car parking for development sites, subject to conditions. The car parking rates identified in the Scheme establish minimum parking rates for different uses.

Historically, the car parking provided under the original planning approvals for Palmerston City Centre did not meet the provisions under the Planning Scheme. Concessions were granted for pioneering projects with the intent that parking structures would be provided at a later date to meet user demand.

Today the above process has resulted in a vehicle dependent pattern of development where the major identity of the city centre is a sea of free parking. Driving is a necessity and walking, cycling or catching public transport into the city centre is often not viable. Although not always readily apparent, issues associated with this model include:

- Free parking affects travel choices, encouraging employees to drive to work;
- Minimum parking rates satisfy the peak event demand, resulting in an oversupply of parking;
- The hidden costs of parking are bundled into the cost of property, rent and services which often raises the cost of living;
- Parking is a by-product of statutory planning, rather than being a strategic lever it can use over time.

Given the vision for the Palmerston City Centre and its evolution from a vehicle orientated city centre into a city for people, the master planning process has identified the opportunity to implement a progressive parking strategy that is informed by best practice tailored to the Northern Territory.

Key elements of the strategy include:

- Recognise parking as an independent land use with a financial value that can be delivered in different ways, facilitating the unbundling of the hidden costs of parking;
- Set 'minimum to maximum' parking rates for different uses, thereby allowing a market responsive approach to parking based on user demand;
- Enable the City of Palmerston to be a provider of parking within the city centre with a variety of benefits, including reducing developer costs in the City Centre;
- Reduce city centre traffic congestion and improve retail trade by establishing a differential pricing system for new on-street parking and structured parking over time;
- Encourage employees to use sustainable transport through an Employee Cash-Out Scheme;
- The use of in-lieu cash payments and / or a 'special levy' as a source for the City of Palmerston (COP) revenue to fund parking and other civic infrastructure over time.

Whilst still providing for adequate parking that is critical in the City Centre over the short to medium term, it is anticipated the above elements will bring a number of benefits to Palmerston City Centre over the long term. These include reduced traffic and congestion, improved public transport, strong local economy and economic resilience. The balance of this report outlines the Strategy.



STOP



Conventional Parking, Costs and Issues

- 1.1 The problem
- 1.2 The high cost of minimum parking requirements
- 1.3 Minimum parking costs raise house costs and reduce urban density
- 1.4 The inequality of free parking
- 1.5 An innovative parking solution
- 1.6 Key Lessons and Insights

1.1 Overview

‘Rather than parking working in the service of cities, cities have been working in the service of parking, almost entirely to their detriment’ (Speck, 2012 p. 116)

Car parking is an end of trip facility for the private car. However, excessive car parking, particularly free parking, combined with the ease of travel afforded by private car travel, inevitably results in increased vehicular movements.

The current response to this issue is to widen roads to facilitate easier travel by private cars and then provide more car parking to accommodate the ever growing vehicle movements.

However, in reality, as Shoup (1997) articulates, the provision of additional parking is ‘a fertility drug for cars.’ Shoup (1997, p.3-4) goes on to explain:

‘Understanding the problem as too few parking spaces, planners require developers to provide more parking. But if the problem is too many cars rather than too few parking spaces, minimum parking requirements make the original problem even worse. The problem, however, is neither a shortage of parking nor an excess of cars. I will argue the fundamental problem is free parking.’

Currently, the number of parking bays required for individual developments is calculated by identifying the peak demand generated by the proposed land use.

Conventional approaches to parking require minimum numbers of bays to be provided according to land use and the scale of individual developments and does not take into account on street parking. Further conventional parking standards are not based on shared parking arrangements which reflect the differing parking requirements and times of different uses.

This approach results in an over supply of free well located parking, increased private car travel and consequently more congested roads. In addition, minimum parking requirements linked to individual developments, have resulted in a range of unforeseen consequences including higher cost of housing and goods and reduced urban densities leading to urban sprawl. Transportation and land use today would look very different if parking had always been priced to cover its costs



Car parking surrounding the water tower



Car parking dominates streetscapes



Car parking sits in front of retail



More public space is given to cars than to pedestrians

1.2 The high cost of minimum parking requirements

‘Because (parking) is so plentiful and often free to use, it is easy to imagine that it costs very little. But this is not the case’ (Speck 2012, p.16)

In most cases, parking is provided by, and initially paid for, by the developer. The developer then passes these costs on to the purchaser/tenant/customer through higher housing, rental and retail costs and consumer goods as the cost is diffused through the economy. Unknowingly, we are all paying for parking when we purchase a coffee, or go out to dinner, even if we did not drive or do not own a car. Speck (2012, p.118) describes the situation:

‘Nobody can opt out of paying for parking. People who walk, bike, or take transit are bankrolling those who drive. In doing so, they are making driving cheaper and thus more prevalent, which in turn undermines the quality of walking, biking and transit.’

Wherever there is well located, accessible free parking, even in cities with high residential densities and efficient public transport systems, people are more inclined to drive.

Over and above incentivising people to drive, the excessive parking requirements ultimately impact on the ability to create lively city centres. Examples of this include:

- The “Pensacola Parking Syndrome” – is a term that has been coined in reference to Pensacola, an historic town in Florida where sadly, the heritage fabric of the town, has been largely destroyed and replaced with unattractive parking facilities required to support new development. The end result is the degradation of the city centre environment reducing the number of visitors and causing a disconnect between the supply and demand of parking. Australian examples include locating parking stations
- on the beachside of foreshore roads such as Cottesloe, City and Scarborough Beaches in Perth, Western Australia which impact on the amenity and attraction of the beach.
- Excessive minimum parking requirements can have a significant impact on the viability of development proposals and at worst can lead to unsightly vacant sites. More creative approaches to parking include reducing minimum parking rates through shared parking arrangements that reflect the different parking demands of different uses at different times.
- The ability to expand existing uses within a city centre can be compromised by the inability to physically provide the additional parking required on-site, or the prohibitive cost of providing cash in lieu of parking. For example a café may wish to expand by providing outdoor dining which would increase the vitality of the public realm and particularly the night time economy. Additional car parking requirements enforced for this expanded use may result in the outdoor dining being unfeasible.
- The requirement to provide a specified number of car bays per residential apartment, irrespective of location, can increase housing costs by up to 20%. A study in Oakland, USA found that by requiring even one parking space per home increased housing costs by 18% and reduced density by 30% (Speck, 2012, p. 124).

CASE STUDY - COFFS HARBOUR

Coffs Harbour is a coastal town in New South Wales that is similar to Palmerston in many ways. Constrained by car dominance, a lack of funding, and limited public transport, accessing Coffs Harbour City Centre for locals and large numbers of visitors is becoming increasingly challenging. The Coffs Harbour City Centre Master Plan 2031 was prepared to establish the preconditions to attract new investors and stimulate economic activity with a focus on place capital.

In March 2013 Council adopted the Master Plan including 10 city wide strategies and 12 projects. These ranged from the immediate actions, such as an improved city park (under construction), to game changers for the city centre, such as a new cultural building and convention centre. In June, IPART approved the special rate application providing an additional \$8M in funding to be delivered over the next eight years.

Of particular relevance is the innovative solution that was proposed for parking within the City. Whilst Council had budgeted \$8m for public car parks over the next ten years, there was no budget for cultural infrastructure.

Through an integrated strategy optimising existing parking infrastructure by introducing angle parking on wide streets, timed parking and improving the function and spaces of existing car parks, and by applying a modal split of 10% to sustainable transport it was discovered that only \$3m would be required to satisfy the future parking demand. The surplus of \$5m within the original \$8m budget has been reallocated towards a new cultural building in the city's centre.



1.3 Minimum parking requirements raise housing costs and reduce urban density

‘Parking requirements make higher densities impossible without multilevel parking garages... the high cost of parking is the reason why almost every new suburban building is either less than three stories tall or more than ten stories tall, only a tower can pay for a parking garage’ (Duany, Plater-Zyberk & Speck, 2000, p. 207)

Excessive parking requirements limit development potential. The area required to satisfy parking standards, on small sites in particular, often exceeds the commercial or retail floorspace, impacting on the feasibility of development proposals. This in turn can limit the range of uses that are financially able to locate within city centres, reducing the diversity of uses necessary to support a viable city centre.

Alternatively, providing parking in shared public facilities enables the more effective use of floorspace for other uses that actively contribute to the city centre. By reducing the area dedicated to parking a more compact city centre can be created. This increases the desirability and ability for people to walk and cycle, further decreasing the demand for car parking.

Adopting a shared parking approach between residential and other uses, particularly in a city centre, is a more efficient use of land. It reflects the differing peak parking demand periods of different uses and reduces the overall amount of parking required. In addition, consolidating parking in a smaller number of larger shared public facilities is more cost effective than constructing multiple smaller car parks.



Cities for cars - parking centric design with surface car parks, blank walls

Cities for people - human centric design, car parking is located off-site with ground floors and the public domain activated

1.4 The inequality of free parking

If parking is 'free' or underpriced, who is paying?

Parking is based on an unequal pricing structure. Consumers bear the cost of parking even if they are not using the facility as the cost of parking is passed onto consumers in the form of higher prices.

Whilst, the majority of travel is undertaken by cars, a significant proportion of people also walk, cycle and take public transport. Providing 'free' parking and passing on the costs to all does not represent an equal environment for all users with those using sustainable transport modes also indirectly funding the cost of parking for those who continue to choose to drive. Car travel inevitably leads to road network congestion creating greater delays for private vehicles and road based public transport vehicles. Rather than looking to reduce congestion by providing facilities to accommodate active travel options such as cycle lanes and public transport the more typical response is to merely widen the road to allow for even more cars to travel freely.

This creates further inequity between private motor vehicles and more sustainable travel options. Although public transport, and other sustainable travel modes, have the capacity to carry greater numbers of passengers, the vast majority of road space is dedicated to private vehicles.



Conventional parking models penalise the 21st century citizen who walks, bikes and users public transport

1.5 An innovative parking solution

“Parking, like roadway capacity, is what economists refer to as a free good. Most people who use it do not pay its full cost, as a result, it is overused and subject to shortages. When parking is provided – especially on street – it should vary in price around the clock proportionate to demand.” Duany, Lydon and Speck, 2010

Overview

An occupancy of 85% is considered optimal for managing car parking demands within city centres. Catering for 85th percentile of parking utilisation is widely accepted as an appropriate benchmark. Utilisation above 85% is likely to result in changed driver behaviour, including increased vehicle circulation, tailgating pedestrians and double parking.

The 85th percentile provides adequate levels of parking except for the 5-6 busiest weeks of the year which is approximately four weeks at Christmas and New Year, and about two weeks around Easter and Mothers Day.

The additional demand experienced at these two peak periods can be accommodated by:

- Educating the community that longer walking distances may be required and over flow parking may extend beyond the city centre into adjoining residential areas
- Changing travel habits to including the use of alternative transport modes, increased car occupancies and peak spreading

While parking may be constrained at peak times, planning to the 85th percentile reduces the amount of car spaces required. In addition, there are a range of other approaches to parking that not only reduce the “hidden” costs of parking, but enable parking costs to be more equitably and sustainably shared through smarter pricing strategies designed to influence behaviour change and reduce parking demand.

Pricing parking

Providing free car parking leads to an expectation that it will always be free. However, most ‘free’ services tend to be overused

and reinforce existing behaviour patterns. Developing a tailored pricing strategy for parking can be a catalyst for change and crucial to the management of parking assets.

Enabling the use of on street parking

On-street parking should be taken into account when calculating parking supply. Requiring all parking to be provided on site duplicates parking supply, increases development costs and lessens the ability to create a compact walkable city centre. In addition, introducing parking meters on centrally located street parking bays will result in more people using the spaces for shorter periods of time, supporting local businesses and facilitating convenient access for people willing to pay a premium.

Decoupling parking

Traditionally, car parking controls require parking to be provided on site. A more sustainable model now widely used, involves locating parking on sites away from the primary land use largely in shared parking structures. This is a more cost effective way of providing parking, increases pedestrian movement and results in a finer grain more compact urban form.

Car parks on the periphery

Locating shared car parks on the periphery of a city centre frees up high value land within the centre to be used for the highest and best use whilst supporting an active and attractive streetscape. Further, encouraging people to walk from the edge of a city centre to their destination activates the streets, supports the local businesses and improves the vibrancy and safety of a centre.



111 Lincoln Road, Miami - hybrid parking structure with retail and cultural spaces

1.6 Key lessons and Insights

14 Insights Towards A Strategic Parking Strategy

- Well located parking contributes to the success of centres providing an important facility for many visitors and shoppers
- Minimum parking requirements hide the cost of parking by bundling it into higher housing prices, higher consumer prices, lower urban density, and lower land values. Everyone pays for free parking
- The space requirements and cost of providing parking can limit the development potential and feasibility of a site and increase development costs
- Parking is a cost to developers that is passed onto the consumers through higher prices
- Parking standards are typically based on the peak demand resulting in a surplus of free spaces promoting the dominance of the car as the preferred mode of travel
- Minimum parking requirements can inflate parking supply which leads to increased demand, which is then used to inform future parking needs
- Free parking changes the character of the urban environment by encouraging sprawl and reducing the ability to create vibrant centres
- Minimum parking requirements are a “one size fits all” approach based on a range of assumptions that are not tailored to reflect locational characteristics, proximity to public transport, affordability, and other matters that can influence parking demand
- Poorly designed and configured out parking can detract from the streetscape and activation of a city centre
- The sharing of parking facilities between different uses is a proven method of managing parking requirements, for example at the St Margarets Car Park in Bourke Street Sydney
- Providing well designed car parks around the periphery of a city centre with clear and safe walking links to key destinations can enhance the vibrancy of a centre and provide a more economic efficient model
- The cost of free parking is not borne equitably, as it is ultimately paid by everyone, even those who do not use it
- There is an opportunity to utilise existing on street parking to reduce parking requirements on individual developments and to introduce a “user pays” system for the convenience
- Parking should be priced to reflect the level of convenience it offers to encourage turnover and support the local businesses

**“Minimum parking requirements have severed the link between the cost of providing parking and the price that motorists pay for it...(they) work against almost every goal of urban planners – except the goal of preventing parking spillover. They increase the cost of urban development, degrade urban design, burden enterprise, promote automobile dependency, and encourage urban sprawl.”
(Shoup, 1997, p. 16)**



Palmerston City Centre Master Plan

- 2.1 Vision and objectives
- 2.2 Development capacity and parking
- 2.3 Alternative parking models costs and benefits
- 2.4 Towards a 21st Century Palmerston Parking Strategy

2.1 City Centre Master Plan

A key objective of the Palmerston City Centre Master Plan is to develop a strategic parking strategy to bring a range of benefits to the city centre. By unbundling the hidden costs of parking and removing the requirement to provide all parking on-site the type of development the city can attract can be diversified, creating city revenue, and a lever to accelerate a shift to sustainable transport.

3.1 Vision

“Palmerston will be a vibrant, tropical city of opportunities.

The city will foster a sense of community in a clean, safe, friendly and sustainable environment that supports and nurtures the lifestyle of residents, workers and visitors.

It will create a vibrant, tropical and lush place that connects a mix of commercial, retail, community, residential and open space, and creates a unique identity; facilitated by authentic city streets that supports a variety of activities, events, informal gathering spaces and entertainment; sustained by safe and convenient public transport and pedestrian links to the wider community.”

3.2 Mission

The vision will be achieved using the following mission:

“To manage and promote diversity, a unique way of life and opportunity, through innovation and excellent experiences.”



Strategy statement

The vision and mission will be achieved through improvements to economic, cultural and ecological opportunities. City of Palmerston will work on creating an involved and supportive community, promoting investment, ensuring

accessibility and capitalising on our natural advantages with an emphasis on sustainability. This will be achieved by addressing the following values:

COMMUNITY VALUES

> Leadership

We will provide clear direction and inspire people to achieve their full potential.

> Teamwork

We will encourage cooperation and teamwork within and between our employees and our community stakeholders.

> Integrity

To act in an honest, professional, accountable and transparent manner.

> Innovation

We will encourage creativity, innovation and initiative to achieve CoP's vision.

> Encourage

Community growth and development.

> Contribute

To the efficient and effective management of the environment, community and economy for present and future generations.

Objectives

The objectives developed to support the vision and mission to be implemented within the Palmerston City Centre Master Plan are:

- 1 To ensure that the City Centre is sustainable and self sufficient. This will be achieved through:
 - > Creation of a sustainable and self-sufficient city centre by creating jobs, promoting public transport use and development opportunities which are commercially feasible;
 - > Reuse existing infrastructure (including parks, circulation aisles, landscaping etc) to limit unnecessary costs in delivering the vision.
- 2 To be responsive and adaptable to the changing environment. This will be achieved through:
 - > Create a robust and adaptable master plan framework which can respond to the changing and fluctuating economic conditions and provide opportunities for a range of development types.
- 3 To facilitate the integration of the diverse and mix of uses with convenient public transport and pedestrian/cycle routes. This will be achieved through:
 - > Improving urban mobility and accessibility by focusing on the needs of pedestrians, cyclists, public transport users and drivers – in that order;
 - > Increased safe, intimate connectivity through landscaped wildlife / green corridors;
 - > Improvement to existing services, facilities and amenities to encourage urban living to support commercial viability;
 - > Creation of pedestrian and cycle pathways and links to the current networks.
- 4 To ensure that Palmerston City Centre remains accessible for vehicles, cycles and pedestrians, including accessibility for disabled persons. This will be achieved through:
 - > Management of traffic along Roystonea Avenue;
 - > Allowing for access points into the town centre at least every 200m;
 - > Develop a strategic parking strategy to bring a range of benefits to the city centre.
- 5 To facilitate the creation of the Palmerston City Centre as a 'place'. This will be achieved through:
 - > Use a place-led approach to the design of streets, public places, precincts and activities, such as markets to create a city centre first and foremost for people;
 - > Ensuring connectivity across the City Centre and providing legible and good way finding;
 - > Integrate a diversity of uses with a quality public realm for pedestrians, cyclists and public transport users;
 - > Creation of special places and unique areas for public art where people can relax, or enjoy more active spaces for cultural and social recreation;
 - > Creation of a public square and meeting place to relax, meet, or celebrate.
- 6 To ensure good built form outcomes and the relationship with the public realm through the inclusion of design guidelines. This will be achieved through:
 - > Development of built form guidelines to support the Master Plan;
 - > Development of a car parking strategy to support the Master Plan.

The creation of a Master Plan that adequately meets the objectives will guide growth in Palmerston in a positive direction and create a more sustainable and liveable city over time.

2.2 Development Capacity and Parking

The proposed master plan provides a robust framework able to accommodate a substantial increase to the floor space.

Under the vision and design guidelines for the city centre, the master plan envisages a 'High Low City' density model focuses on creating a fine grain, human scale city where taller towers are evenly distributed to create optimised view sharing and solar amenity.

The majority of streets are defined by buildings ranging between 5 to 12 storeys. Within this framework, the 'High Low City' model distributes taller towers on a block-by-block basis where new towers are located in response to any existing towers to create an open skyline, optimise solar amenity and view sharing.

Under the modelled scenario, the development capacity of the city centre is approximately 500,000m² of floor space with the assumed split:

Residential GFA

300,000m² or approximately 3000 dwellings / 7,200 residents

Non-Residential GFA

200,000m²

Based on the above development capacity and current Northern Territory Parking Rates, in parallel with new development approximately 18,000 car parking spaces (450,000m²) would have to be provided by the private sector at a total cost of approximately \$468 million (average \$26,000 per parking space, on site above ground).

Given the current city centre has a total land area of approximately 32.2ha, attempting to provide 45 hectares of parking would result in a city design driven by parking, not people.

Over the life of the City Centre Master Plan between 10,282 and 20,564 parking spaces may be required by the proposed minimum to maximum parking rates.

There is an opportunity for CoP and the NT Government to provide 6,301 spaces over the staged construction of stand alone parking garages.

Further, within a mixed-use city centre the potential also exists to acknowledge the opportunity for shared parking between different uses with a shared parking discount of 30% a generally accepted rate.

Applying this rate to the city centre, the total amount of required parking has the potential to be reduced to between 7,197 - 14,395 car parking spaces. The total cost of providing this amount of parking is approximately \$187 million (average \$26,000 per parking space).

Based on the above analysis, it is evident that the development capacity of the city centre can generate a huge difference in the amount of parking provided dependent on the model used.

The next section outlines the alternate models.

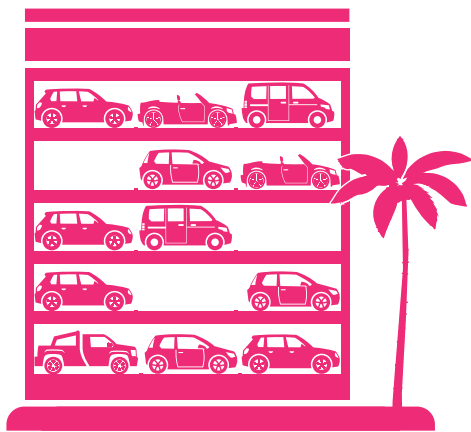
PALMERSTON PARKING STRATEGY

IT IS EXPECTED
BETWEEN
**10,282 &
20,564**

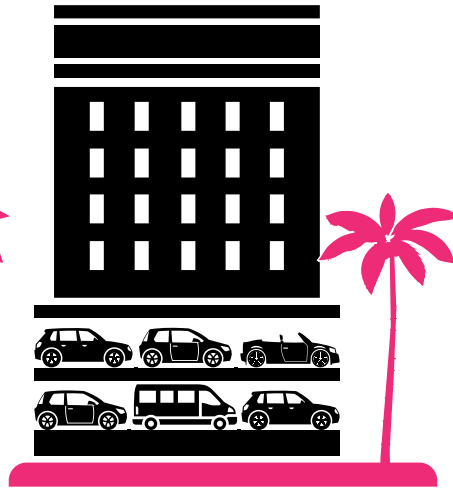
Parking spaces may be required to reflect the proposed minimum to maximum parking rates



PARKING SPACE COSTS:



Efficient above
ground garage
\$18,000
per space



On site above
ground podium
\$26,000
per space



On site
basement
\$35,000
per space

At \$18,000/space, government owned
land could produce garages for:

2,653-3,716
spaces City Of Palmerston

\$67m

3 Key Opportunities for parking garages:

Stage 1: 443 Spaces
\$8 million

Stage 2: 2076 Spaces
\$37 million

Stage 3: 1197 Spaces
\$22 million

Total: \$67 million

Parking rate comparison

The following parking rates provide a comparison of the car parking minimums and maximums in city centres around Australia. Car parking rates are moving from being controlled by minimum standards to maximum standards in city centres to create more active, vibrant and attractive city centres.

Sydney and Melbourne cap the provision of parking for apartments to between 0.3 - 1 car space per unit. The provision of parking for commercial and retail development is also decreasing. Brisbane restricts car parking to a maximum of one space every 200m² of retail or commercial development.

This is important to Palmerston as it is now being nationally recognised that to create functional and attractive city centres with economically feasible development, onerous and unnecessary car parking minimums need to be replaced by parking maximums. Parking maximums have the ability to influence a decrease in the expensive create of parking that is underutilised, taking up prime location within city centres.

	DARWIN	SYDNEY	MELBOURNE	BRISBANE	GOLD COAST
RESIDENTIAL	Average 1.5/ dw (min)	0.3/ 1 bd unit (max) 0.7/ 2 bd unit (max)	1/ 1-2 bd dw (max)	Average 1.25/ dw (min)	1/ 1 bd unit (min) 2/ 2 bd unit (min)
RETAIL	1/ 33sqm (min)	1/ 60sqm (max)	1/ 25sqm (max)	1/ 200sqm (max)	1/ 15 sqm (min)
COMMERCIAL	1/ 33sqm (min)	1/ 175sqm (max)	1/ 28sqm (max)	1/ 200sqm (max)	1/ 25sqm (min)



Palmerston City Centre Master Plan - Overview of development capacity

2.3 An alternative parking model

This strategy proposes an alternative to conventional parking to provide a more equitable and cost efficient outcome

Conventional parking models require that car parking is estimated for each land use and site separately and provided for on site. This requires the construction of costly podium or underground car parking within a development. The construction of these car parks, in some cases, may limit the development potential of a site and result in undesired outcomes including:

- Inactive street frontage due to ground floor car parking (unless it is sleeved)
- Greater urban sprawl as car parking takes up considerable floorspace that could be used for residential or commercial development
- Sterilizes some sites that are not able to satisfy additional parking requirements alongside parking requirements
- Increases construction costs to developers which they pass on to buyer and tenants, which then converts to higher housing prices, consumer goods and services

The alternative model proposes multi-storey car parks located on the periphery of the city centre to facilitate the construction of space and cost efficient parking.

The construction of up to 3 multi-storey car parks will provide efficiencies in construction whilst enabling parking to be shared across residential and commercial uses at different times of the day reducing parking demand.

Developers can financially contribute towards the construction of multi-storey car parks at a reduced rate per car space as the construction and land costs are significantly reduced.



Conventional Parking Model



Progressive Parking Model



Palmerston City Centre Parking Strategy

- 3.1 Overview
- 3.2 Parking Strategies
- 3.3 Parking Calculator

3.2 Parking Strategies

The following strategies support the development of an innovative 21st Century parking model for the Palmerston City Centre

Sustainable Growth and Resilience

Principles

- Gradually replace surface car parks in the centre with multi-storey car parks around the edges
- Shift from inefficient private multi-storey car parks that are shared across residential, retail and commercial uses

The proposed parking model provides the basis of how a change in parking provision can result in a more sustainable and resilient city. By reducing the amount of surface car parks in the city centre, the land can be used more efficiently for a variety of land uses to create an active and vibrant city centre.

The construction of a handful of public multi-storey car parks will use resources more efficiently. Developers can have the option to construct required parking on site, or pay a contribution at a levy at a cheaper rate than the cost of providing parking on site. This levy will contribute to the cost of the construction and maintenance of the multi-storey car parks. The levy is able to be collected at a lower rate due to the cost efficiencies achieved by consolidating the required parking on sites at the periphery of the city centre.

The contributions model or levy provides for the sustaining of the quality of the city centre as contributions collected can be used for city improvements after the public multi-storey car parks are built.

Strategic Relation of Anchors and Parking

Principles

- Shift from a car park city centre, to a city centre for people
- Maximise street activity by separating anchors and parking
- Create a high quality public realm along key pedestrian routes
- Provide vehicle access and loading along secondary pedestrian routes

The strategic location of the public multi-storey car parks at the periphery of the city centre results in the creation of active pedestrian streets between the car parks and key destinations. Creating a walkable distance between the car parks and key anchors will maximise street activity, improve safety and support local ground floor retail and commercial developments with passing foot traffic.

To support these walking routes improving the public domain in these locations will be prioritised. These walking streets will discourage vehicle access, with loading docks and bays to be located along secondary pedestrian routes.

3.2 Parking Strategies

Sustainable Transport

Principles

- Promote walking and cycling
- Accelerate a modal shift towards sustainable transport
- Ensure sustainable transport is user friendly and that wayfinding is clear for all

An acceleration of a modal shift towards active transport, including the use of public transport, cycling and walking will be influenced by the following:

- Improve public realm to encourage walking by improving safety and a sense of security, lighting, footpaths, surveillance and activation of street
- Encourage cycling by providing cycling infrastructure, encourage end of trip facilities, and the promotion of cycling routes
- Encourage employers within the city centre to create work travel plans and/ or incentives to encourage the utilisation of active transport for journeys to work
- Support the introduction of additional bus services to support growth and a modal shift away from car dominance

Multi-storey car parks

Principles

- Design multi-storey car parks as people places
- Activate the ground floor of car parks
- Promote events and other activities
- Design for long term adaptability to other uses, such as residential

Support the development of the city centre as a people place by providing multi-storey car parks that are safe, interesting and convenient to use. Consider supplying car park users with incentives to encourage their use such as free water in summer, reusable shopping bags to borrow, daily newspapers, car washing etc. Ensure the design of car parks engage with the streetscape and are open to the street with good surveillance, minimising blank walls.

In addition, ensure the adaptability of multi-storey car for potential future uses, such as residential apartments. Providing structures that have the capacity for adaptation is an important measure to accommodate the growth and change of the city centre over time. Technological change may also see the introduction of new features, functions and conveniences within car parking structure.

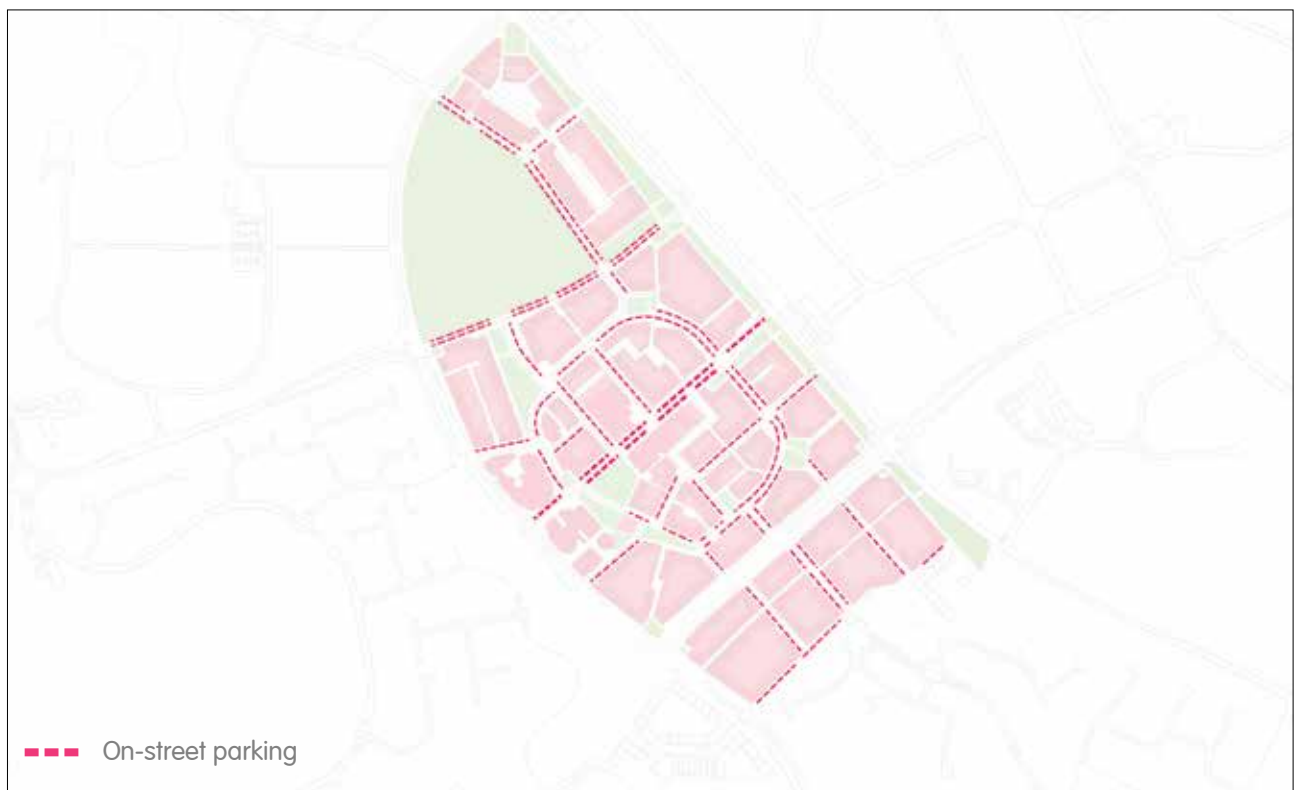
3.2 Parking Strategies

On-street Parking

Principles

- Utilise on-street parking
- Price the most proximate and sought after on street parking at the highest rate

On-street parking around key destinations should be utilised to provide convenient and accessible parking with a high turnover rate. On-street parking plays an important role in the function of a city centre, enabling direct and fast access for quick trips and errands removing the need to park at a multi-storey station. On-street parking should be timed, and priced at key destinations to facilitate quick turn over.



Smart Parking

Principles

- Use demand-responsive pricing to free up parking on each block to reduce circling and double parking
- Design multi-storey car parks to adapt to technological change

Smart parking involves utilising 'smart' thinking to facilitate improved results in parking efficiency, convenience and function. A key part of smart parking is using demand-responsive pricing. This approach ensures high turn over and encourages people to consider alternative modes of transport or park further away from destinations if time allows.

This results in an improved user experience for on-street car parks in front of key destinations which become available more readily in addition to encouraging people to either park at the periphery of the city where it is free or significantly cheaper, or utilise active transport.

3.2 Parking Strategies

Parking Controls

Principles

- Provide market-responsive parking controls
- Improve housing and lifestyle affordability, by reducing the requirement to own a car

Currently, the Northern Territory Planning Scheme sets the minimum car parking requirements for various land uses across the Northern Territory that apply to Palmerston City Centre. The following minimum parking requirements are proposed to amend to the proposed minimum to maximum requirements. Rather than providing for the absolute maximum parking need calculated for every use individually, introducing parking minimum to maximums will allow the market to dictate the required parking.

	Existing requirement (minimum)	New requirement (minimum to maximum)
Home based visitor accommodation	1 for every guest room plus 2 for the dwelling	0.5-1 for every guest room plus 1-2 for the dwelling
Child care centre	1 for every employee plus 1 for every 20 children	0.5-1 per employee
Community centre	5 for every 100m ² of net floor area	2.5-5 for every 100m ² of net floor area
Education establishment	For a primary school or secondary school: 1 for every classroom plus 2 additional spaces plus an area for setting down and picking up passengers For a tertiary education establishment: 1 for every classroom plus 1 for every 6 students plus 2 additional spaces For a kindergarden: see child care centre For other education establishments: 1 for every 100m ² of net floor area, 1 for every 100m ² of net floor area other than offices plus 4 for every 100m ² of net floor area of office plus 1 for every 250m ² used as outdoor storage	For a primary school or secondary school: 0.5-1 for every classroom plus 1-2 additional spaces plus an area for setting down and picking up passengers For a tertiary education establishment: 0.5-1 for every classroom plus 0.5-1 for every 6 students plus 1-2 additional spaces For a kindergarden: see child care centre For other education establishments: 0.5-1 for every 100m ² of net floor area, 0.5-1 for every 100m ² of net floor area other than offices plus 2-4 for every 100m ² of net floor area of office plus 0.5-1 for every 250m ² used as outdoor storage
Home based child care centre	1 for every non-resident employee in addition to those spaces required for the dwelling	0.5-1 for every non-resident employee in addition to those spaces required for the dwelling
Hostel	1 for every 5 persons plus 1 for every staff member plus 1	1 for every 5-10 persons plus 0.5-1 for every staff member
Hotel	16 for every 100m ² net floor area used as a lounge bar or beer garden plus 50 for every 100m ² net floor area used as a bar plus 10 for a drive in bottle shop plus 1 for every guest suite or bedroom plus 3 for every 100m ² used for dining	8-16 for every 100m ² net floor area used as a lounge bar or beer garden plus 25-50 for every 100m ² net floor area used as a bar plus 5-10 for a drive in bottle shop plus 0.5-1 for every guest suite or bedroom plus 1.5-3 for every 100m ² used for dining
Independent unit	1 per bedroom to a maximum of 2	1-2 per unit
Leisure and recreation	Indoor spectator facilities including cinema or theatre 1 for every 4 seats Racquet court games 4 for every court plus for indoor spectator facilities (if any) 1 for every 4 seats Lawn bowls 20 spaces per green Golf Course 4 per hole plus 5 for every 100m ² of net floor area used as a club house otherwise than specified above, 10 for every 100m ² of net floor area plus requirement for indoor spectator facilities (if any) for every 4 seats	Indoor spectator facilities including cinema or theatre 0.5-1 for every 4 seats Racquet court games 2-4 for every court plus for indoor spectator facilities (if any) 0.5-1 for every 4 seats Lawn bowls 10-20 spaces per green Golf Course 2-4 per hole plus 2.5-5 for every 100m ² of net floor area used as a club house otherwise than specified above, 5-10 for every 100m ² of net floor area plus 0.5-1 for every 4 seats in indoor spectator facilities (if any).

	Existing requirement (minimum)	New requirement (minimum to maximum)
Licensed club	10 for every 100m ² of net floor area used as a lounge area or beer garden plus 20 for every 100m ² of net floor area used as a bar plus 3 for every 100m ² of net floor area used for dining	5-10 for every 100m ² of net floor area used as a lounge bar or beer garden plus 10 for every 100m ² of net floor area used as a bar plus 1.5-3 for every 100m ² used for dining
Medical clinic	4 for every consulting room	2-4 for every consulting room
Medical consulting rooms	3 for every consulting room plus 1 additional space (in addition to the 2 spaces required for the dwelling)	1.5-3 for every consulting room plus 1-2 additional spaces (in addition to the 1-2 spaces required for the dwelling)
Motel	1 for every guest suite or bedroom plus 16 for every 100m ² of net floor area used as a lounge bar or beer garden plus 3 for every 100m ² of net floor area used for dining	0.5-1 for every guest suite or bedroom plus 8-16 for every 100m ² of net floor area used as a lounge bar or beer garden plus 1.5-3 for every 100m ² of net floor area used for dining
Motor body works	6 for every 100m ² of net floor area	3-6 for every 100m ² of net floor area
Motor repair station	6 for every 100m ² of net floor area	3-6 for every 100m ² of net floor area
Multiple dwellings	2 per dwelling	1-2 per dwelling
Office (not elsewhere referred to in this table)	2.5 for every 100m ² of net floor area	2.5-6 for every 100m ² of net floor area
Passenger terminal	5 for every 100m ² of net floor area or as many car spaces as can be provided on 25% of the site area whichever results in the greater number of spaces (calculated exclusive of areas used for taxi stands or bus loading purposes)	2-5 for every 100m ² of net floor area or as many car spaces as can be provided on 25% of the site area whichever results in the greater number of spaces (calculated exclusive of areas used for taxi stands or bus loading purposes)
Place of worship	5 for every 100m ² of net floor area	2-5 for every 100m ² of net floor area
Plant nursery	2 for every 100m ² of net floor area plus 1 for every 250m ² used as outdoor nursery	1-2 for every 100m ² of net floor area plus 0.5-1 for every 250m ² used as outdoor nursery
Restaurant	6 for every 100m ² of net floor area and any alfresco dining areas plus 10 for drive through (if any) for cars being served or awaiting service	3-6 for every 100m ² of net floor area and any alfresco dining areas plus 5-10 for drive through (if any) for cars being served or awaiting service
Service station	2 for every 100m ² of net floor area or 5 whichever is the greater (not including parking serving bowsters)	1-2 for every 100m ² of net floor area or 2.5-5 whichever is the greater (not including parking serving bowsters)
Serviced apartments	1 for every dwelling plus 3 for every 100m ² of net floor area not within a dwelling	0.5-1 for every dwelling plus 1.5-3 for every 100m ² of net floor area not within a dwelling
Shop	6 for every 100m ² of net floor area	3-6 for every 100m ² of net floor area
Showroom sales	4 for every 100m ² of net floor area plus 1 for every 250m ² used as outdoor storage	2-4 for every 100m ² of net floor area plus 0.5-1 for every 250m ² used as outdoor storage
Supporting accommodation	1 for every 4 beds plus 4 for every 100m ² of net floor area used for administrative purposes	0.5-1 for every 4 beds plus 2-4 for every 100m ² of net floor area used for administrative purposes
Vehicle sales and hire	4 for every 100m ² of net floor area of office plus 1 for every 200m ² used for vehicle display	2-4 for every 100m ² of net floor area of office plus 0.5-1 for every 200m ² used for vehicle display
Veterinary clinic	4 for every 100m ² of net floor area	2-4 for every 100m ² of net floor area

3.3 Innovations in Car Park Funding

There are two basic models for the COP to consider in terms of the innovative funding of car parking in the Palmerston City Centre being:

- 1) Upfront Developer Payment
- 2) Special Levy

Upfront Developer Payment

Rather than satisfying their car parking requirements on-site at a certain cost per space, under this model the developer pays the COP a cash-in-lieu parking contribution for the parking. The cash-in-lieu payment, however is reliant on the Consent Authority to determine what amount of car parking spaces should be paid for. The funds collected is then used by the CoP to provide a parking structure in the city centre. Given the economics of building consolidated and efficient parking structures, the cash in lieu rate should cost developers less money than providing parking on-site.

As illustrated opposite, the upfront developer payment would facilitate the delivery of car spaces in parking garages at a rate of approximately \$18,000 (or agreed cost) per space. This would be more economically efficient than developers providing car parking within their developments with the likely cost of \$26,000 per space. In lieu of constructing parking on site, developers would pay \$18,000 per required space. This option has the potential to save \$30 million in the construction of car parking to developers influencing the reduction in flow on costs to the sales price and rent of the developments. This option also leverages capital from developers to CoP to fund the construction of the parking garages.

This financial benefit, coupled with the fact the developer can now utilise podium floor space for a 'higher and better use', creates a strong incentive for the developer to invest in the city centre.

As the market demand for parking goes down because of anticipated improvements in public transport and opportunity to live and work in the city centre, the cash in lieu contribution can be adjusted by CoP in a car parking contributions. Further, during a construction downturn the contribution can be further adjusted to increase

the viability of developing in the city centre compared to other markets.

An additional benefit of this model is the developer pays the money upfront, thereby limiting the amount of capital the COP needs to contribute to the parking structures.

Special Levy

Rather than relying on developer cash-in-lieu contributions, under this model the CoP imposes a levy under Section 157 of the Local Government Act 2011 and collects monies for the particular purpose of car parking or public realm. The CoP can fund the construction of the monies collected under this levy.

Under this model, the city centre is designated as a 'special district' and all land owners who demand a parking space are charged the levy to recoup the cost.

Although this model may require upfront capital by the COP, there are a number of long term benefits for the city centre including:-

- > The COP can monitor actual parking demand versus supply in real time. If surplus parking spaces exist, these spaces can be utilized before new spaces are constructed;
- > If the demand for parking infrastructure declines over time, the COP can use the Special Levy to fund other infrastructure required within the city centre, such as public realm improvements or cultural buildings;
- > If an over-supply of parking spaces exist in the city centre, the COP can convert a unnecessary parking structure into a higher and better use.

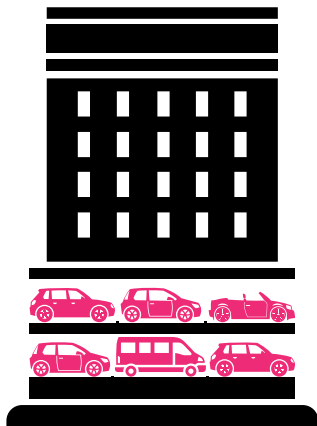
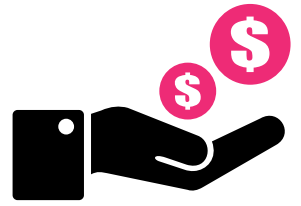
FUNDING OPTIONS

UPFRONT DEVELOPER PAYMENT



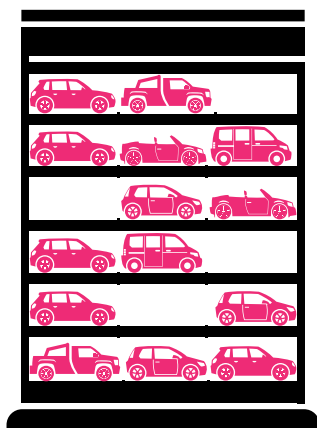
OR

SPECIAL LEVY



Rather than providing CoP parking spaces on site for **\$97mil**

\$26,000
per space

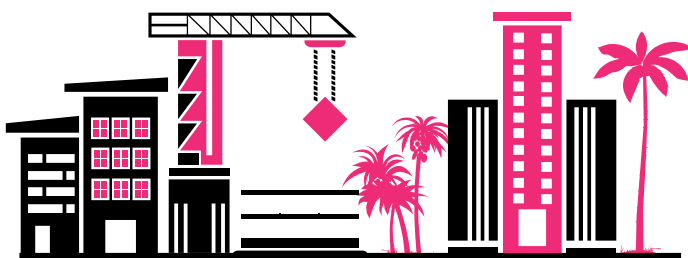


We can deliver 4 CoP owned parking garages for **\$67mil**

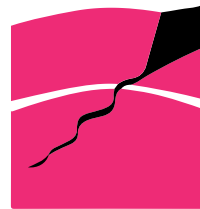
\$18,000*
per space

SAVING \$30m

Developers would pay **\$18,000*** per space to Council to fund the construction of the **parking garages** and **support city improvements**



*Or agreed cost

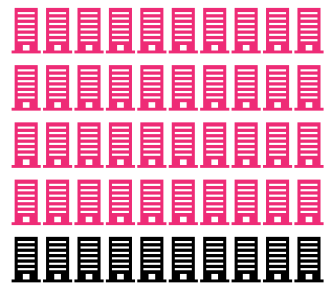


CoP to **fund parking garages** and recover costs through a **special levy**

High Growth:
\$67m divided by
4000 Apartments



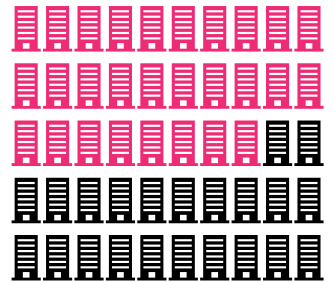
\$16,750
= \$1000/pa for 17 years



Medium Growth
\$67m divided by
2800 Apartments



\$23,930
= \$1000/pa for 24 years



This option is vulnerable if the city centre grows slower than anticipated

This option creates the conditions to support the oversupply of parking. In addition, it does not allow for people who do not drive to opt out of paying for parking.

CASE STUDY - GOYDER SQUARE

With the redevelopment of Goyder Square and the surrounding open space there is the opportunity to create an efficient parking garage on the existing surface car park off Chung Wah Terrace. The existing at grade car park can be dedicated to open space and a new street with between 350 - 500 spaces provided within a stacked parking garage providing significantly more parking than what is existing in addition to providing a more vibrant and activated city centre.



New 5-7 storey parking garage

Recommendations

- It is recommended that City of Palmerston Council adopt the philosophy and principles of the Parking Strategy alongside the Palmerston City Centre Master Plan and Palmerston City Centre Great Streets Strategy as a different approach to the traditional delivery of car parking
- This Strategy has outlined two models for the delivery of the strategy: Upfront development contribution; and a special levy. Based on the potential renewal benefits of each option it would appear that the special levy under the Local Government Act is the most appropriate mechanism deliver the principles and desired outcomes of this Strategy
- It is recommended that the parking rates under the Planning Act (NT) are amended to reflect the minimum to maximums proposed within this Strategy
- Notwithstanding all of the above, it is recommended that Council gains independent urban economics advice to inform Council of the economic implications of both models



References

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