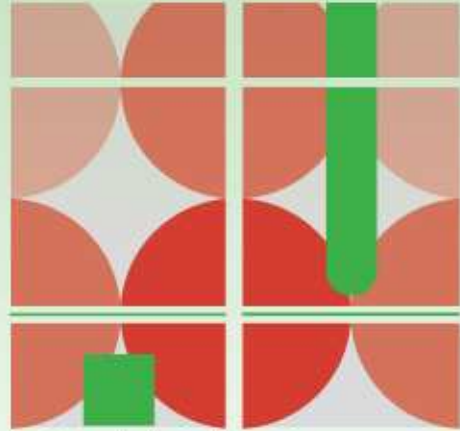


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**2008 NATIONAL
CONGRESS OF THE
AUSTRALIAN COUNCIL
FOR NEW URBANISM**

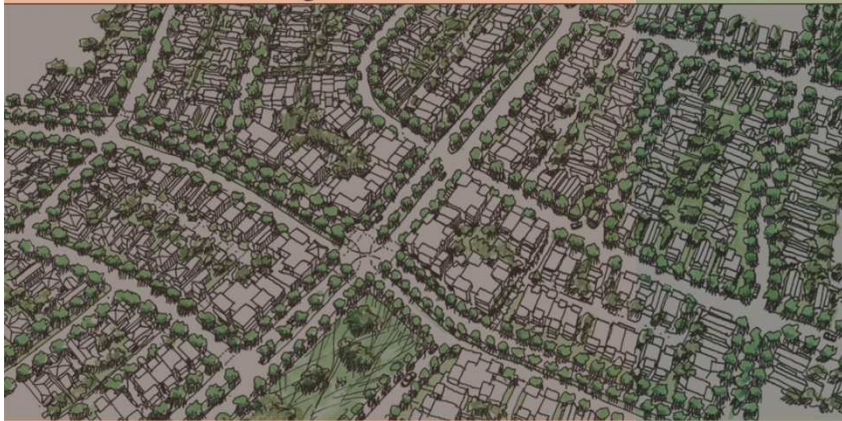
6th – 9th February, 2008



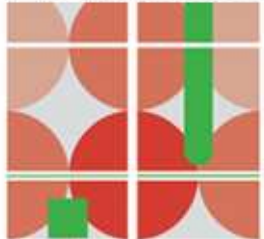
New

QUEENSLAND STREETS

*Design Guidelines for
Neighbourhoods and Towns*



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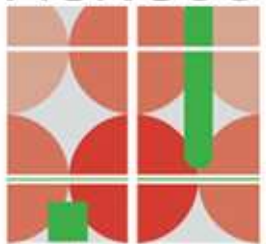
Mike McKeown

Peter Richards

Part 1

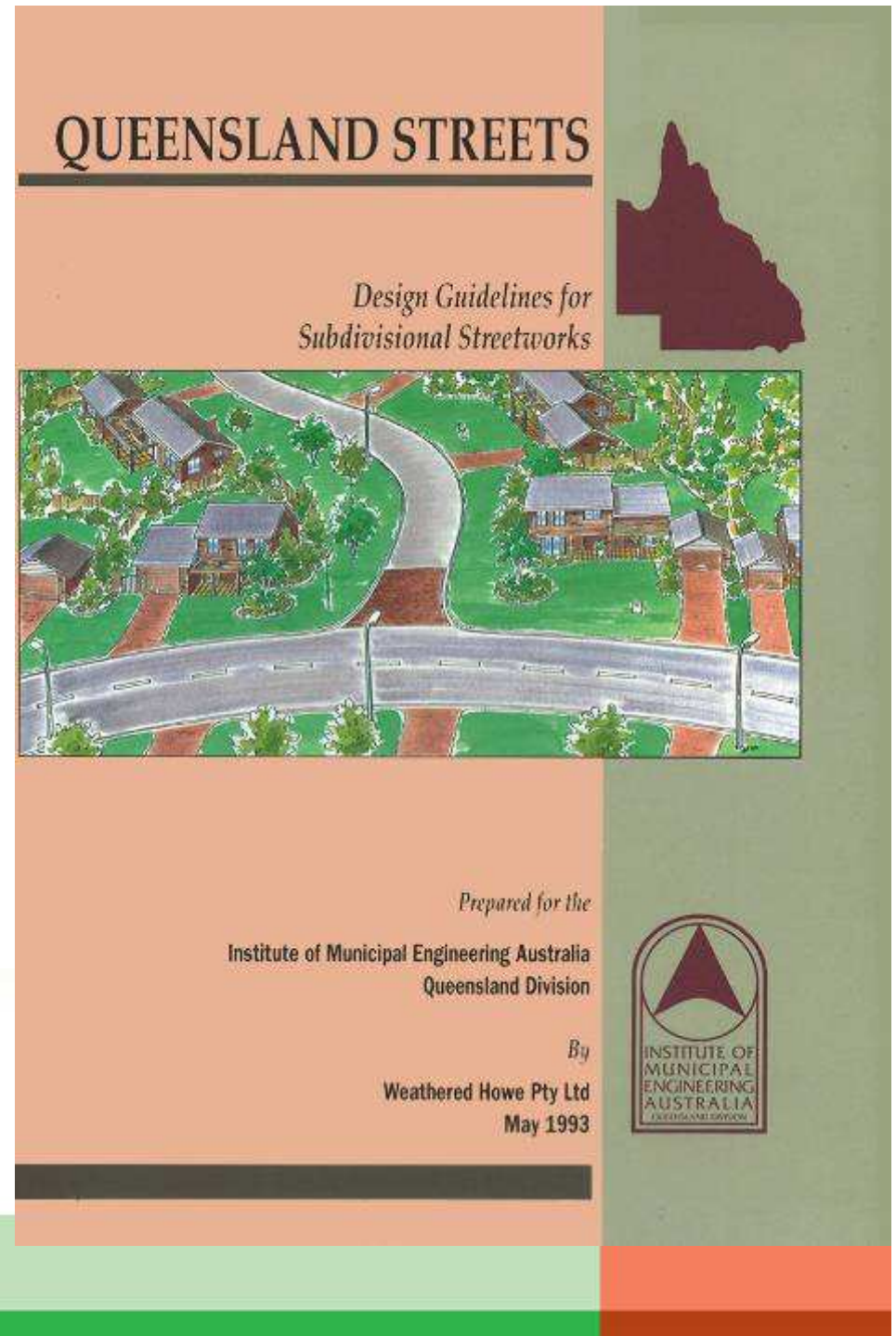
What is *Queensland Streets?*

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- Design Manual
- Cited by many Planning Schemes
- Written as a guideline
- (But used as a standard)

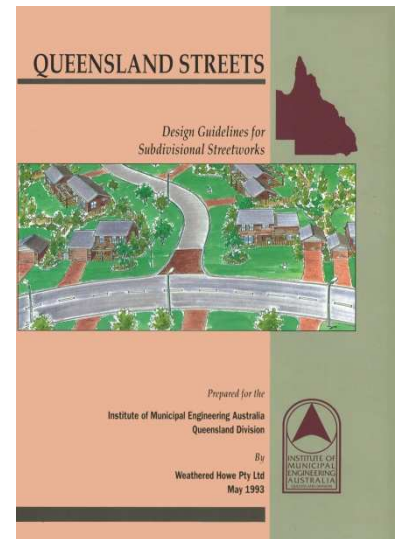


Topics

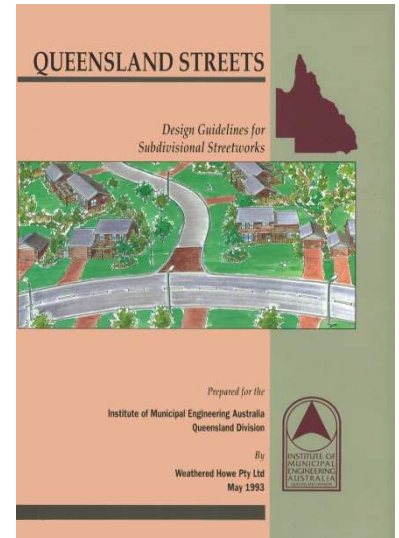
Traffic Volume... Speed...
Parking... Carriageway
Width... Hierarchy...
Geometric
Design... Intersections...
Turning Areas... Speed
Control... Pedestrians and
Cyclists... Design Detail... Road
System... Rural Residential...
Industrial... Medium Density...

Innovations?

- Performance Criteria
- Residential Street V
Traffic Route
- Reduced Vehicle
Speed
- Reduced Traffic
Volume
- “No-Access Collector
Street”



- Essentially Queensland Streets is the driving force behind suburban form and the nature of new streets in Queensland...



- ...helping to produce streets and suburbs that are plain, predictable and standardised; car-centric and hot.

Part 2

The 7 Deadly Sins of Queensland Streets?



The 7 Deadly Sins of Queensland Streets

- 1** No such thing as neighbourhoods and towns only suburbs 1800 lots @10 du/ha with a school as the typological increment of settlements
- 2** Major streets run on the edges of suburbs in a 1200-1600m grid
- 3** No such thing as through traffic in a suburb. Collector streets do not connect and do not go anywhere except to the nearest major road and a hierarchical street network is necessary
- 4** Streets with more than 3000 vpd must be no access and no frontage
- 5** The safe speed in residential streets is 30 km/hr
- 6** Intersection spacing on busier streets should not impede through traffic flow
- 7** Four way intersections are always dangerous. T's and roundabouts are always preferred



- 1 No such thing as neighbourhoods and towns only suburbs 1800 lots @10 du/ha with a school as the typological increment of settlements

'A residential neighbourhood may be defined as a homogenous residential area, .. which is largely self contained'. P68

One obvious desirable feature is that each neighbourhood be capable of supporting its own primary school, so that primary school do not need to cross a major road on their trip between home and school.' P68

Maximum catchment for a primary school from Dept education 1800 maximum, 1800 allotments is considered reasonable optimum for determining neighbourhood size' p68

'Town Planning controls need to be utilised to ensure that land uses other than those designed for do not creep into single dwelling areas, e.g. multi-unit residential, shopping centres etc ...'P16

2 Major streets run on the edges of suburbs in a 1200-1600m grid

‘Neighbourhood boundaries are barriers to movement, eg major roads, railways, rivers or creeks...’P68

*‘The whole design of the residential street system is based on the assumption that it carries only traffic with its destination and origin within the neighbourhood, and that **through traffic is absolutely excluded**’ P71*

‘Locate any required new Major Roads, to conform with Road Authority overall planning, and desirably to provide a “grid” to create viable neighbourhoods of 1200 to 1800 lots. Check that grading, alignment and intersection locations are satisfactory.’ p103



The 7 Deadly Sins of Queensland Streets

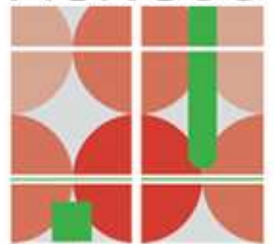
- 3 No such thing as through traffic in a suburb. Collector streets do not connect and do not go anywhere except to the nearest major road

*‘excessive connectivity is undesirable as it may encourage through traffic to rat run through the neighbourhood, make assessment of traffic volumes indeterminate and make the street layout **confusing**...’ Qld Streets P71*

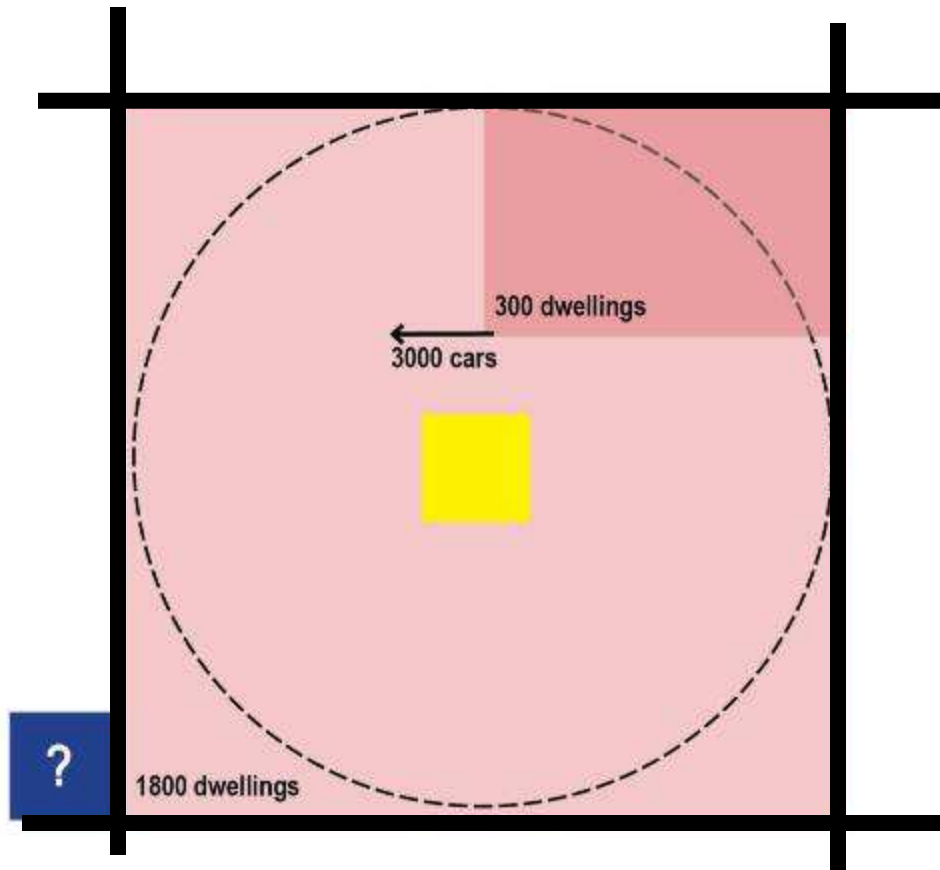
*‘A **grid iron street pattern** is considered quite **inappropriate** in the surrounding essentially residential areas. For residential streets it is considered that a **fully branching hierarchical street system is superior** in Safety, Amenity and Economy and is therefore more appropriate than the grid iron system.’ Qld Streets P10c*

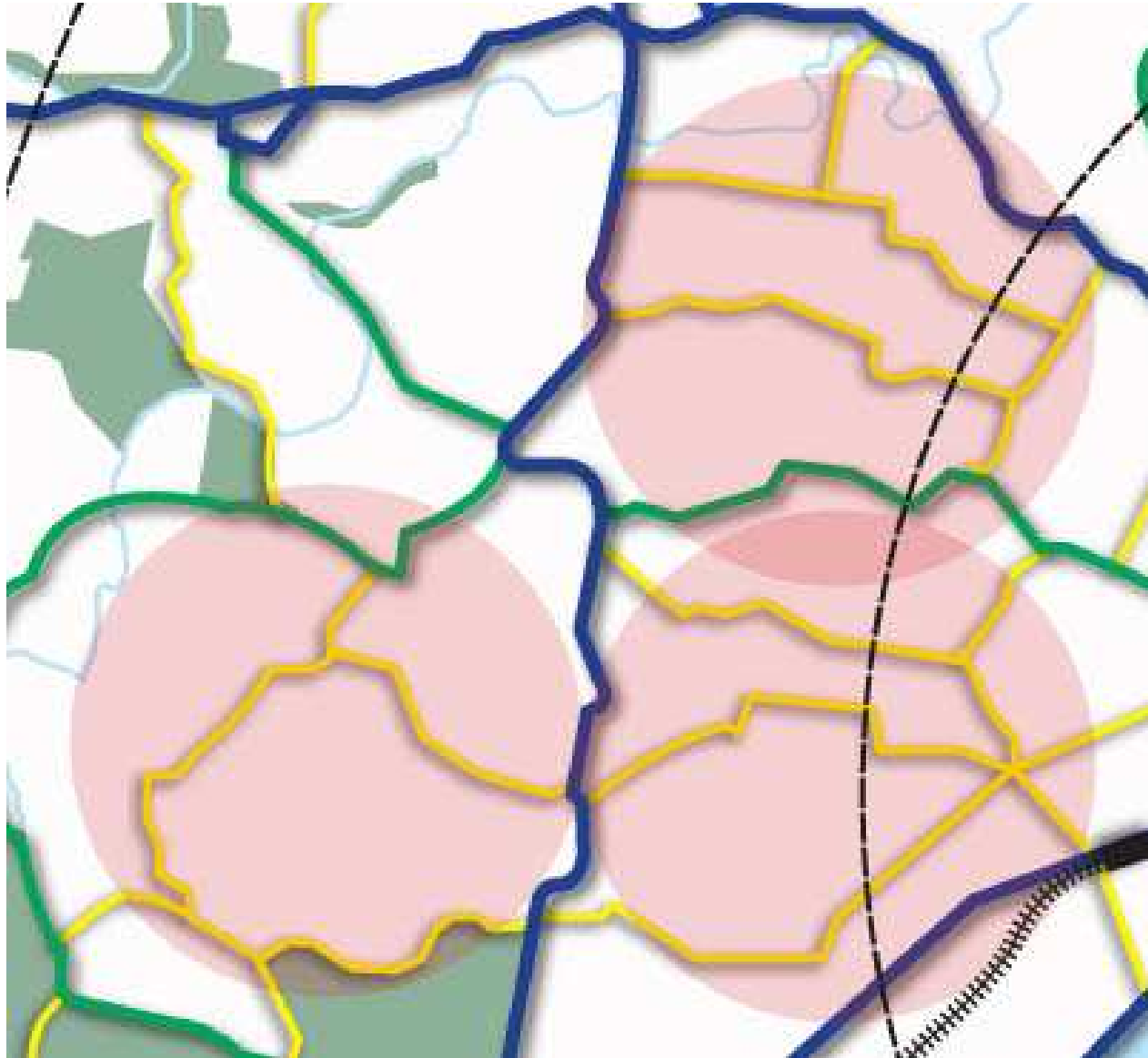


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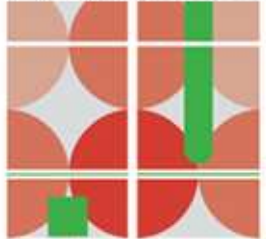


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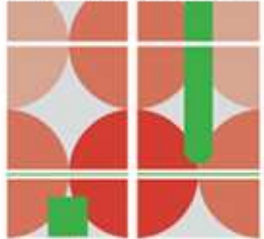
Land-use map diagram: Western Brisbane



Birdwood Terrace, Auchenflower



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Enoggera Terrace, Paddington



How many traffic calming devices are in this plan

A 1-4

B 5-8

C 9-11

D 12+



Windermere, Queensland

Part 3

**What is the role for
Queensland Streets
in 2008 and beyond?**

AN AGENDA FOR URBAN QUALITY
IN QUEENSLAND

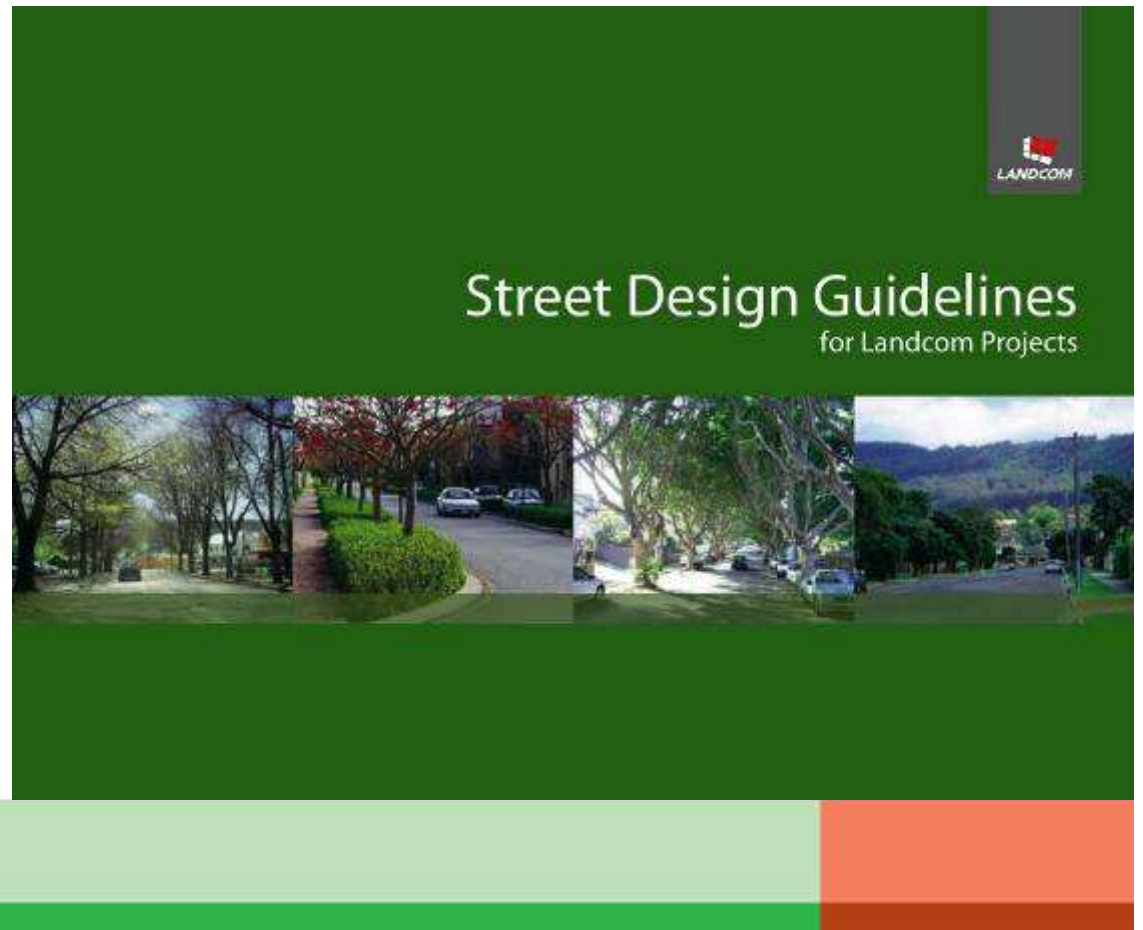


“Qualities of Good Urban Places”

- Connected
- Accessible
- Meaningful
- Legible

Outcomes

- Street Hierarchy by Function
- Interconnected streets
- Use 4-ways where possible
- Don't use roundabouts
- Designed for all users
- Enclosure
- Define property boundaries
- Put trees in carriageway
- Buildings front all streets and major roads





Department for
Transport

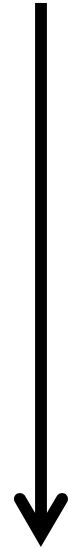


Manual for Streets

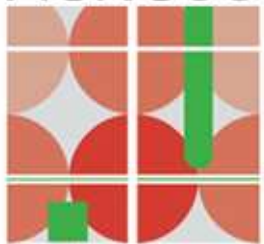


Principle Functions of Streets

- Place
- Movement
- Access
- Parking
- Services



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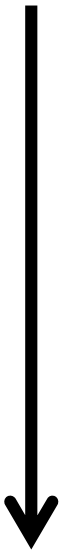
Department for
Transport

Manual for Streets

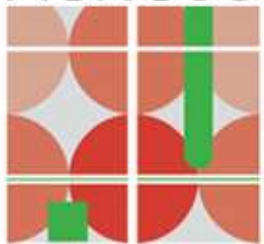


User Hierarchy

- Pedestrians
- Cyclists
- Public Transport
- Servicing
- Cars



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Place
Movement
Access
Parking
Services

Laurel Ave,
Brisbane



Place
Movement
Access
Parking
Services



Bulimba,
Brisbane



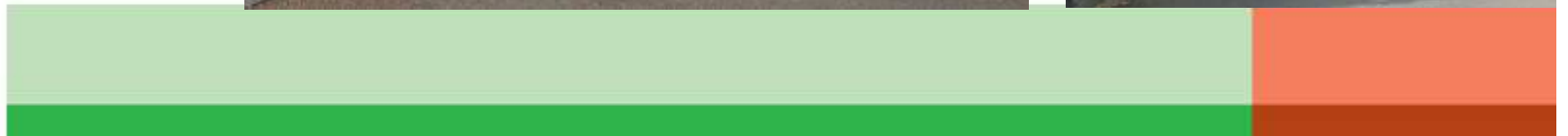
Varsity Lakes,
Gold Coast



Place
Movement
Access
Parking
Services



Forest Lake &
Park Hill,
Brisbane



Place
Movement
Access
Parking
Services

Grey St & Edenbrooke, Brisbane



Part 4

A New Hierarchy of Streets for Queensland?



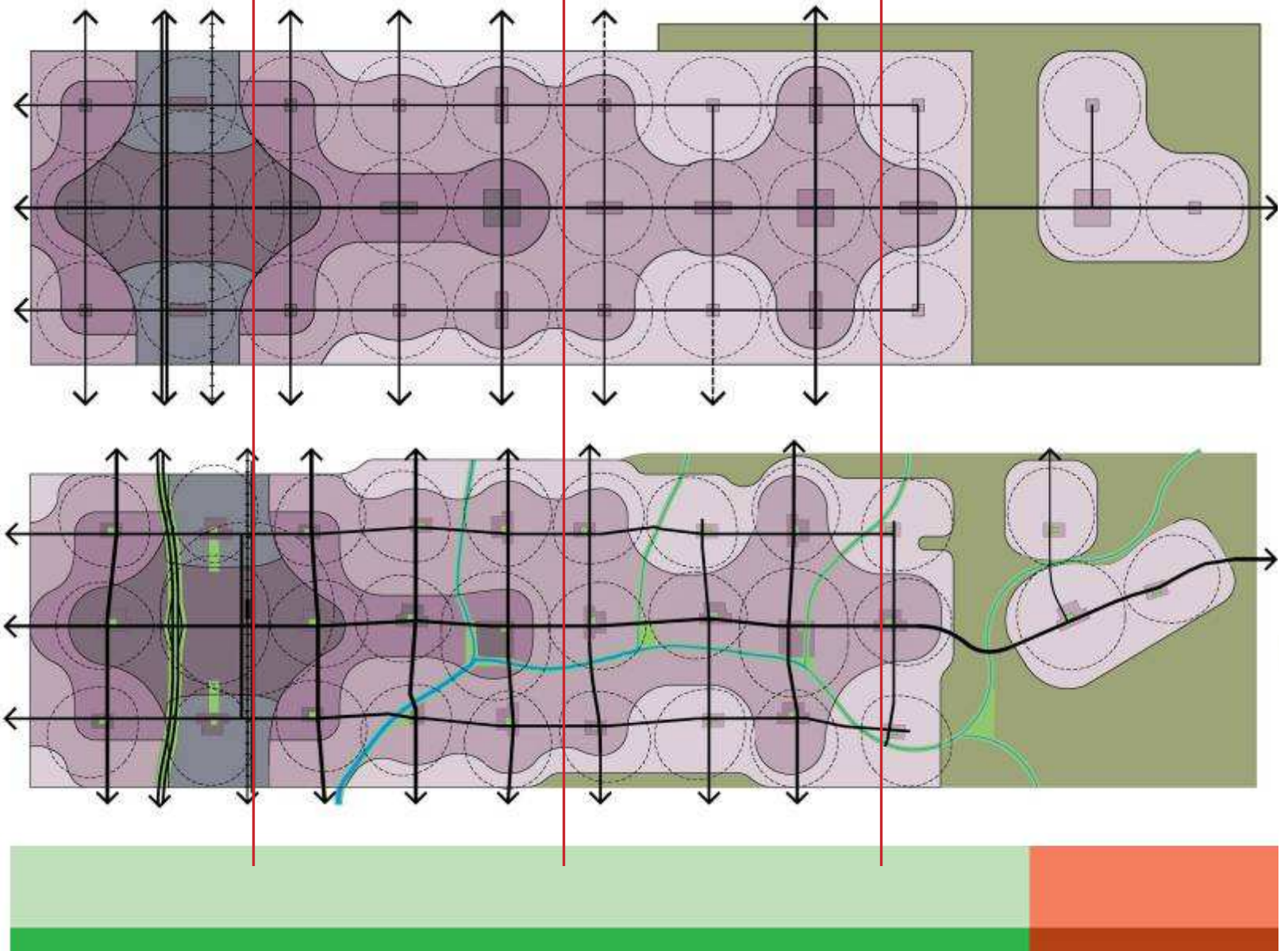
The **7** Deadly Sins of Queensland Streets

TOD

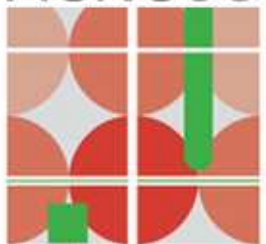
Large Town

Small Town

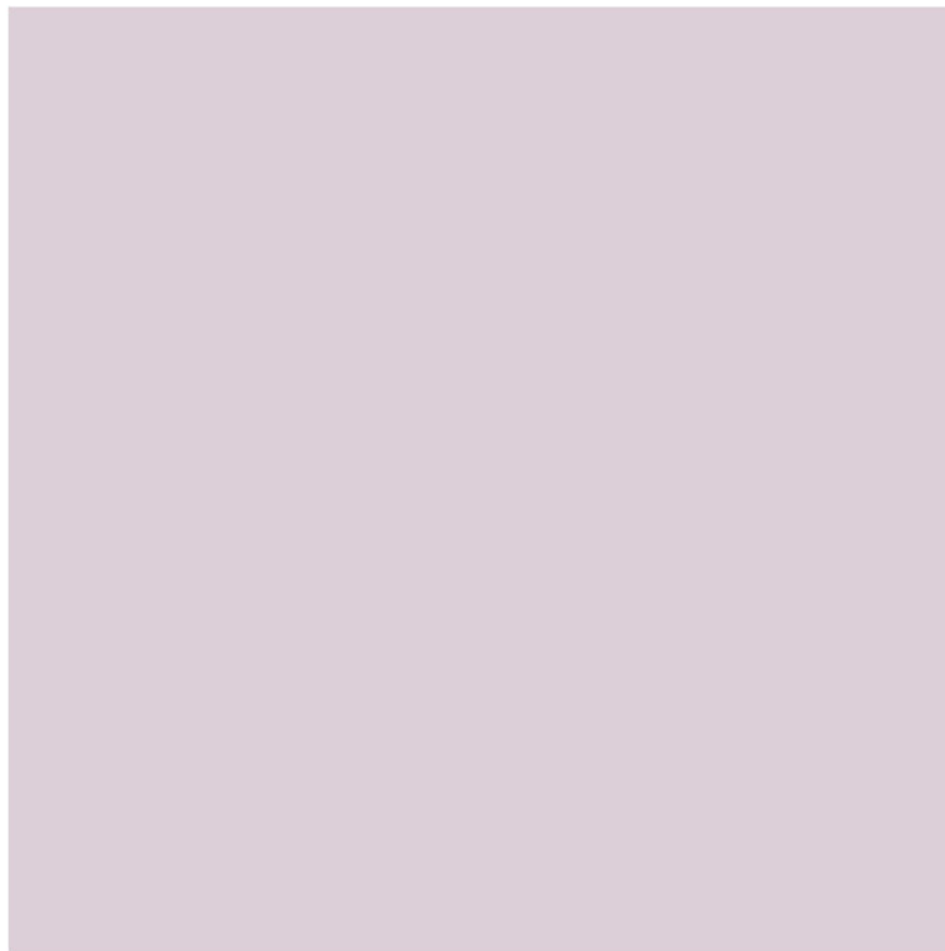
Hamlet



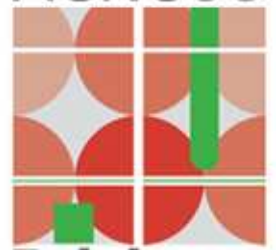
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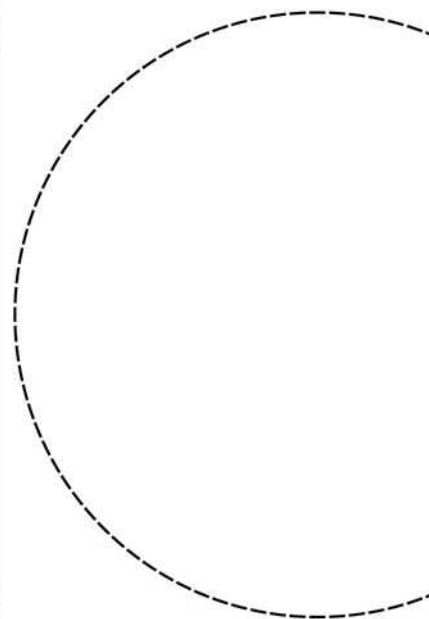
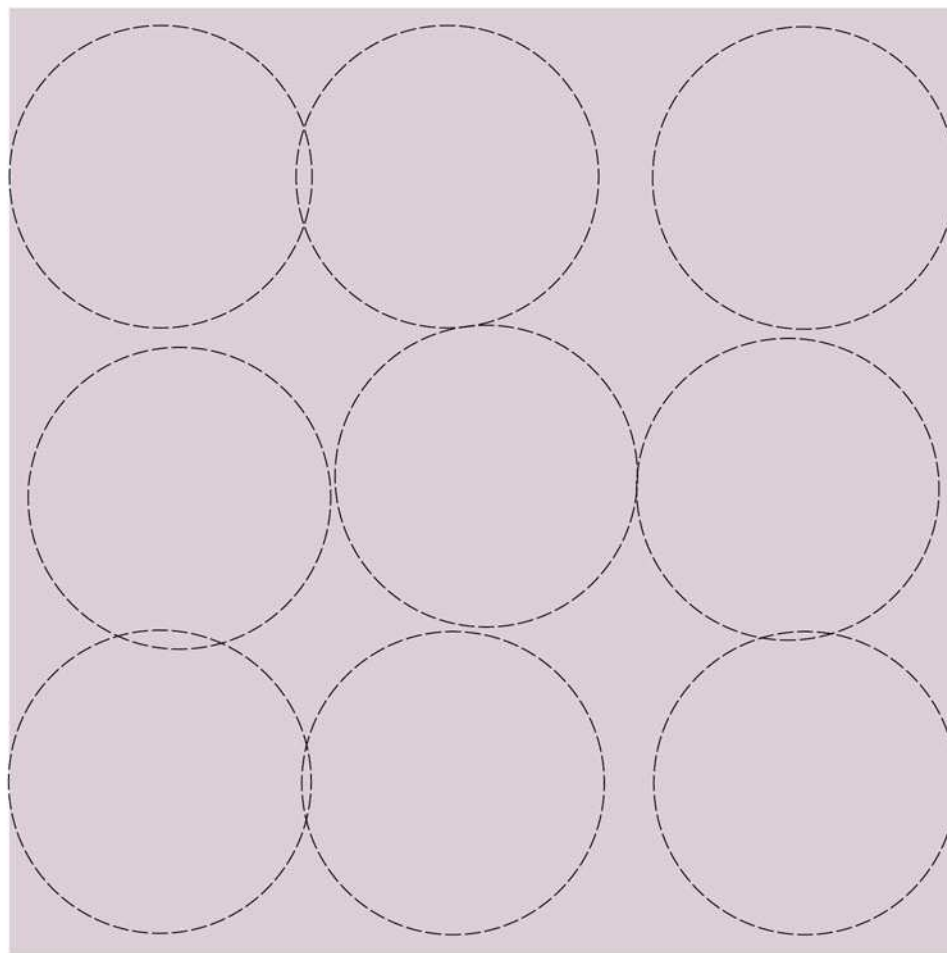
Brisbane



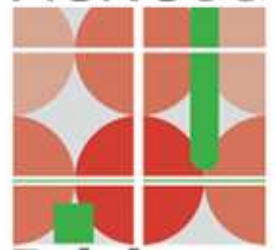
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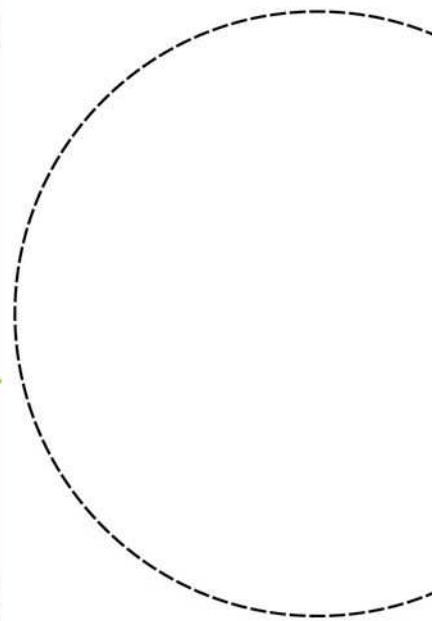
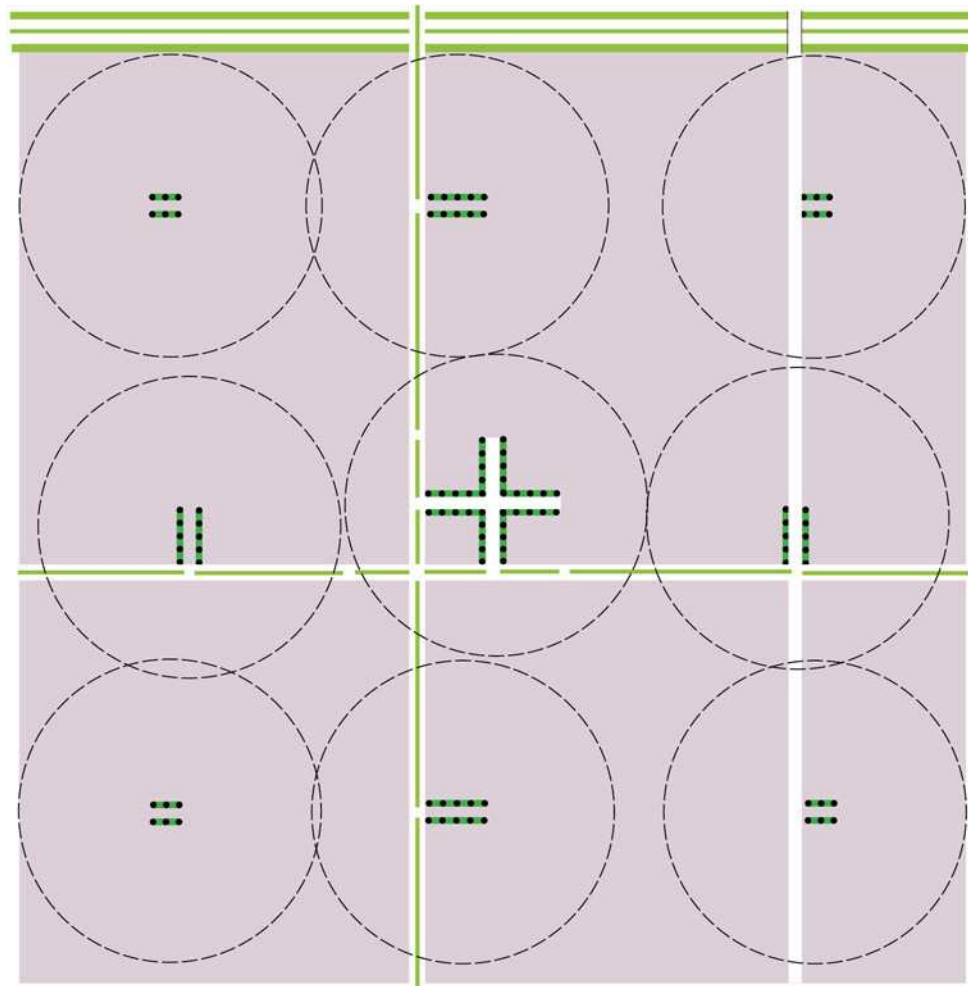
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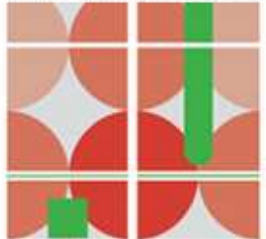
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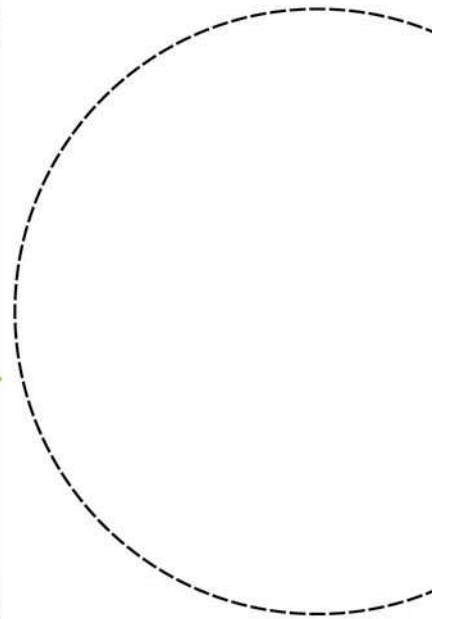
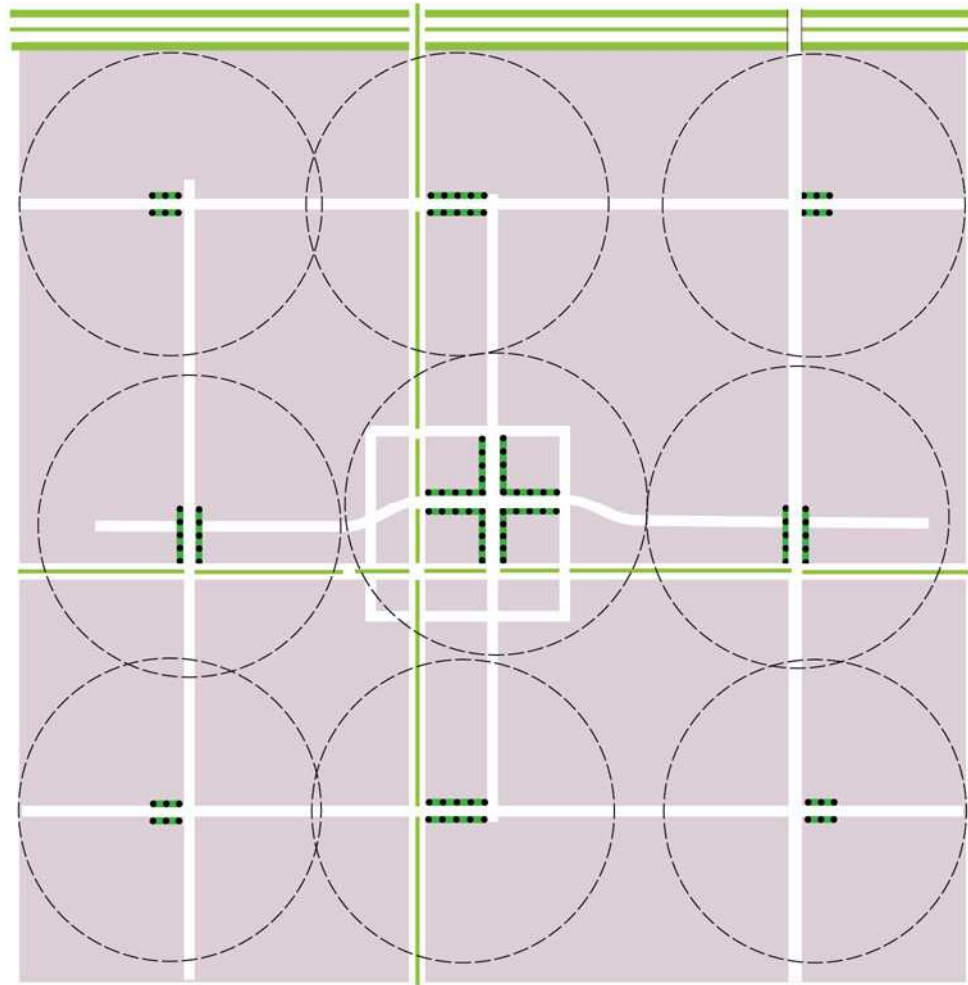
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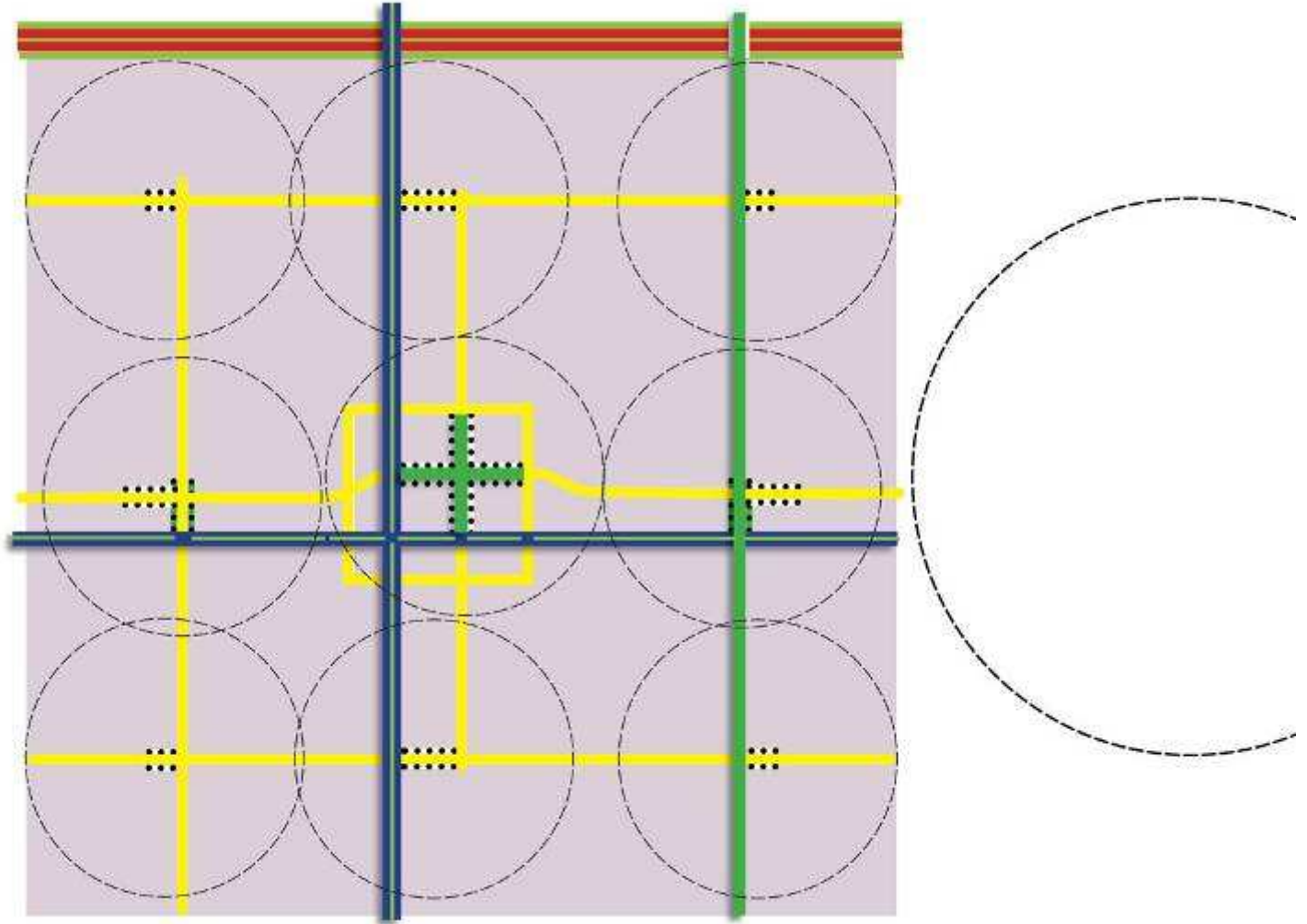


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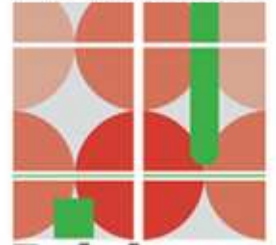


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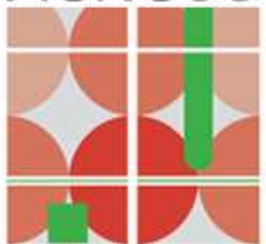
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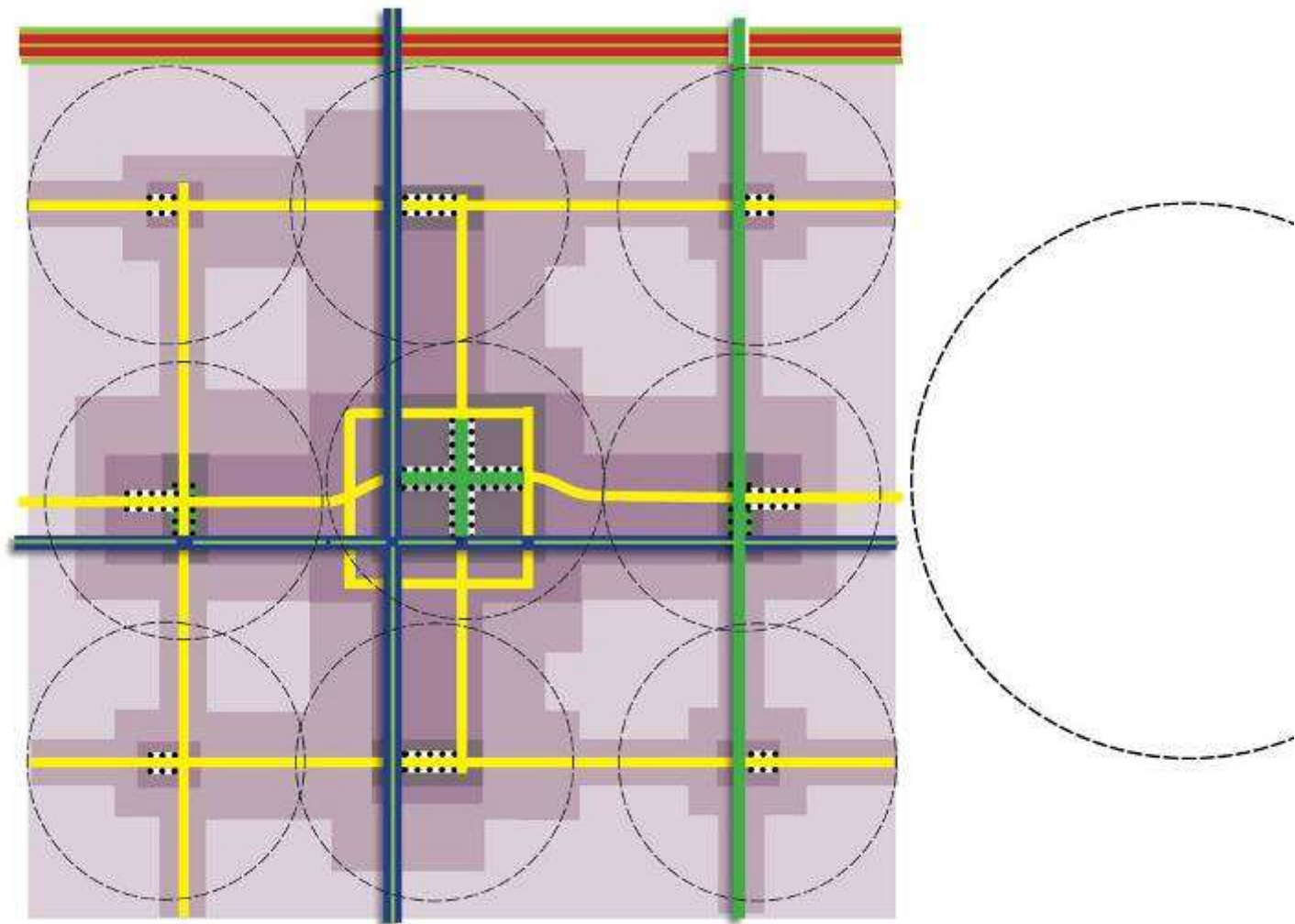
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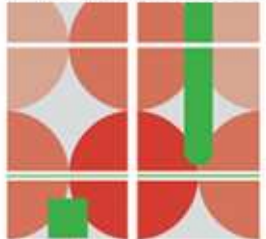
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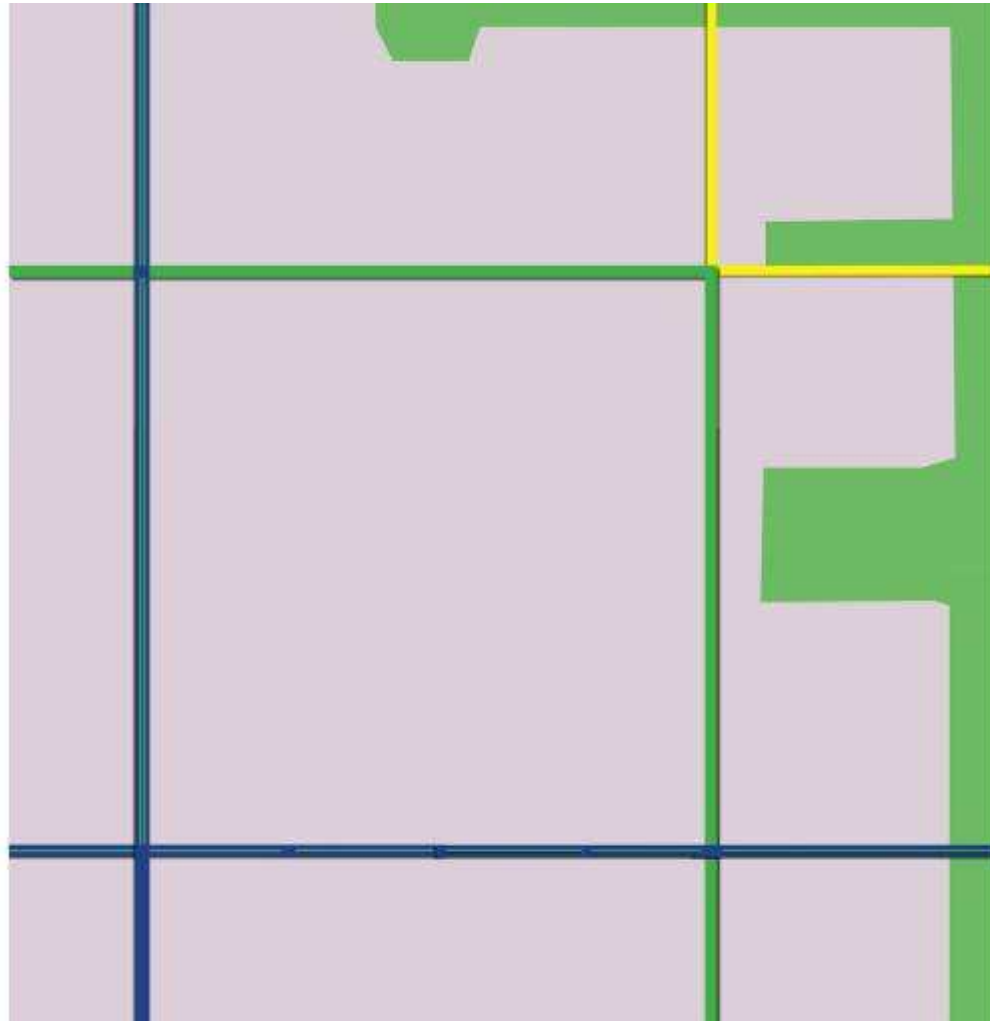
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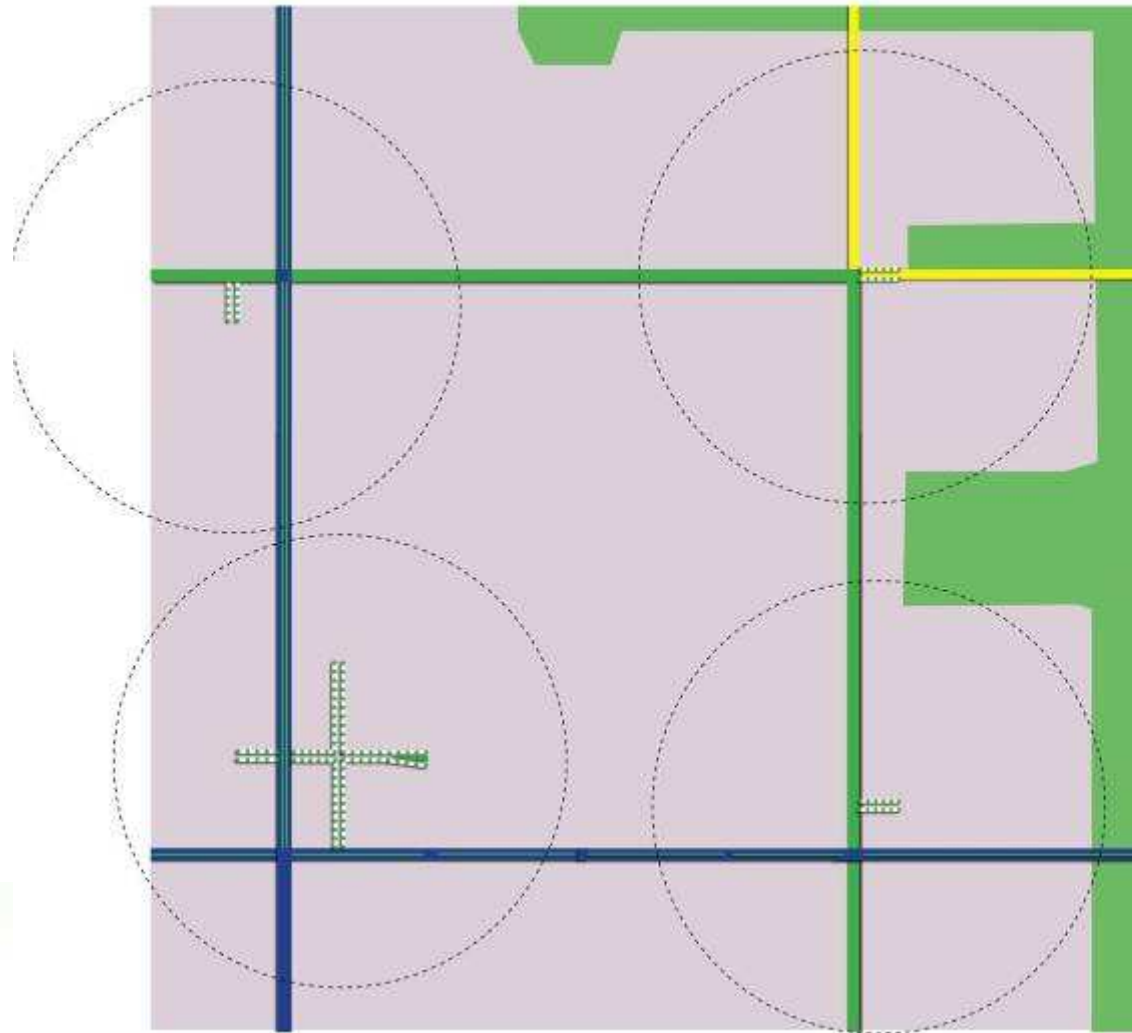


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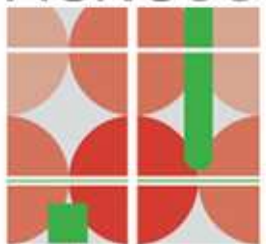


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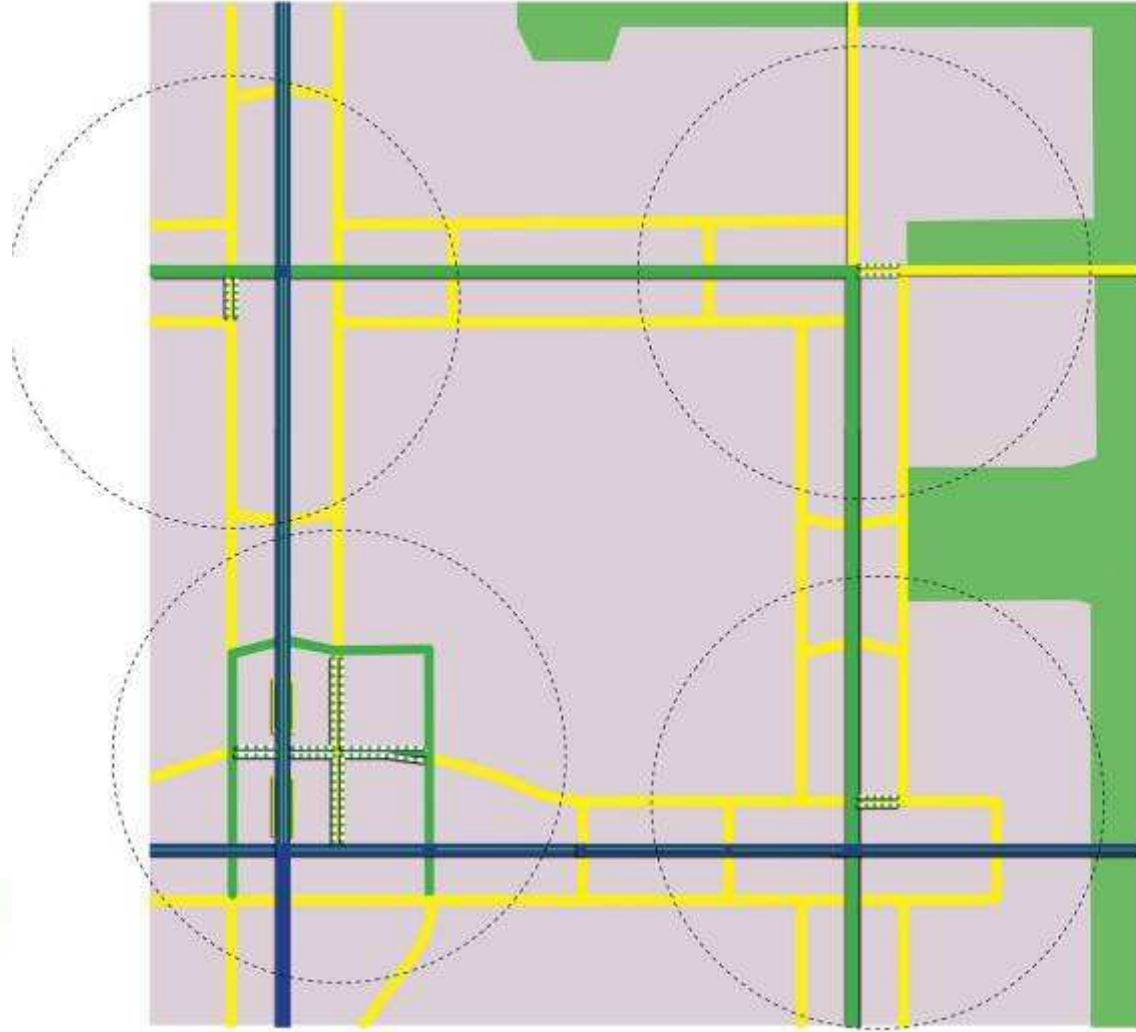


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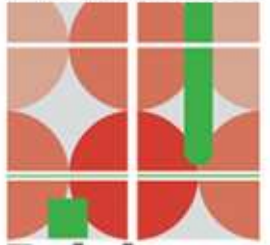


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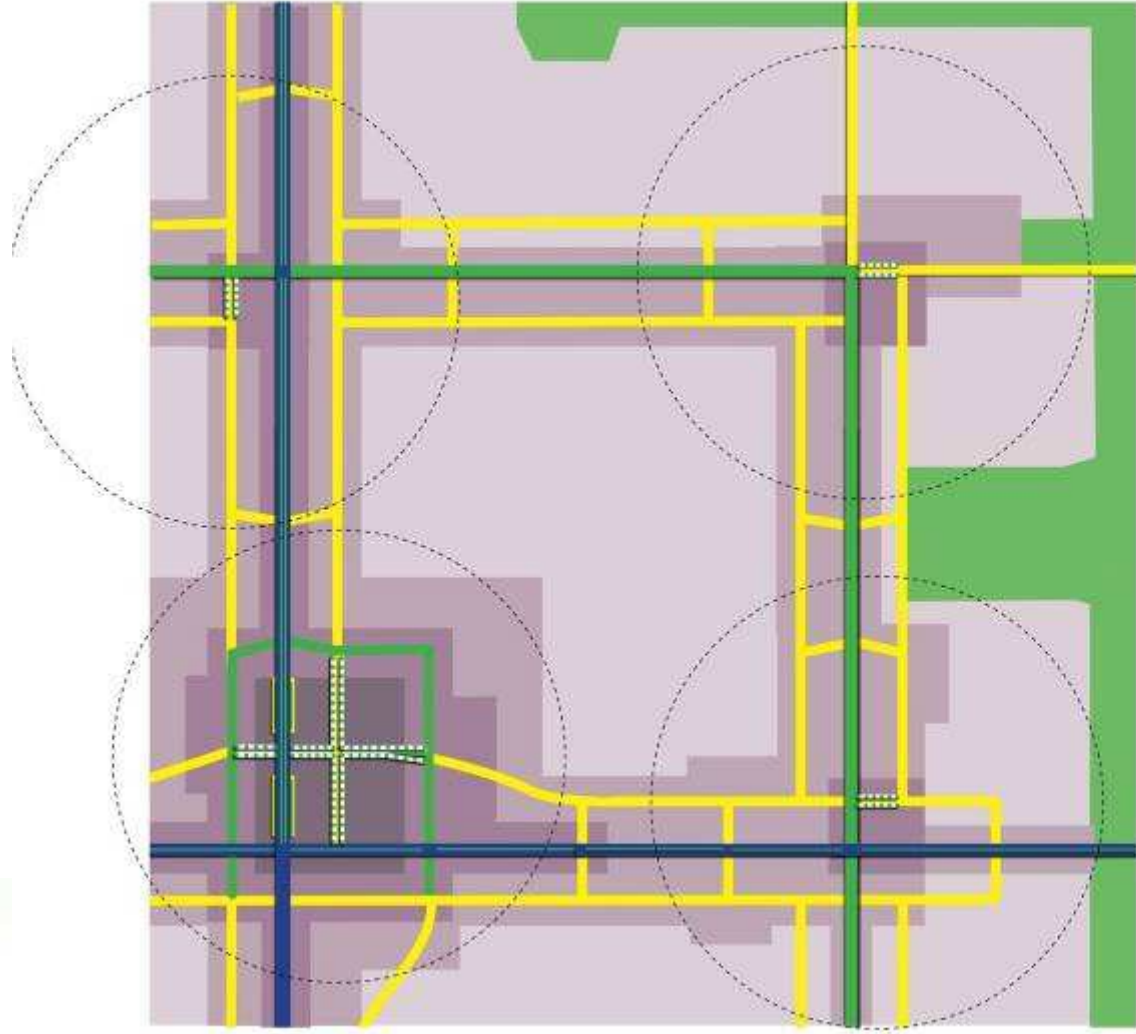


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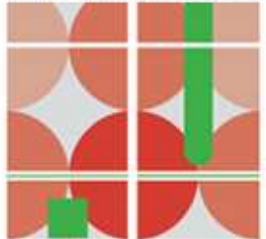


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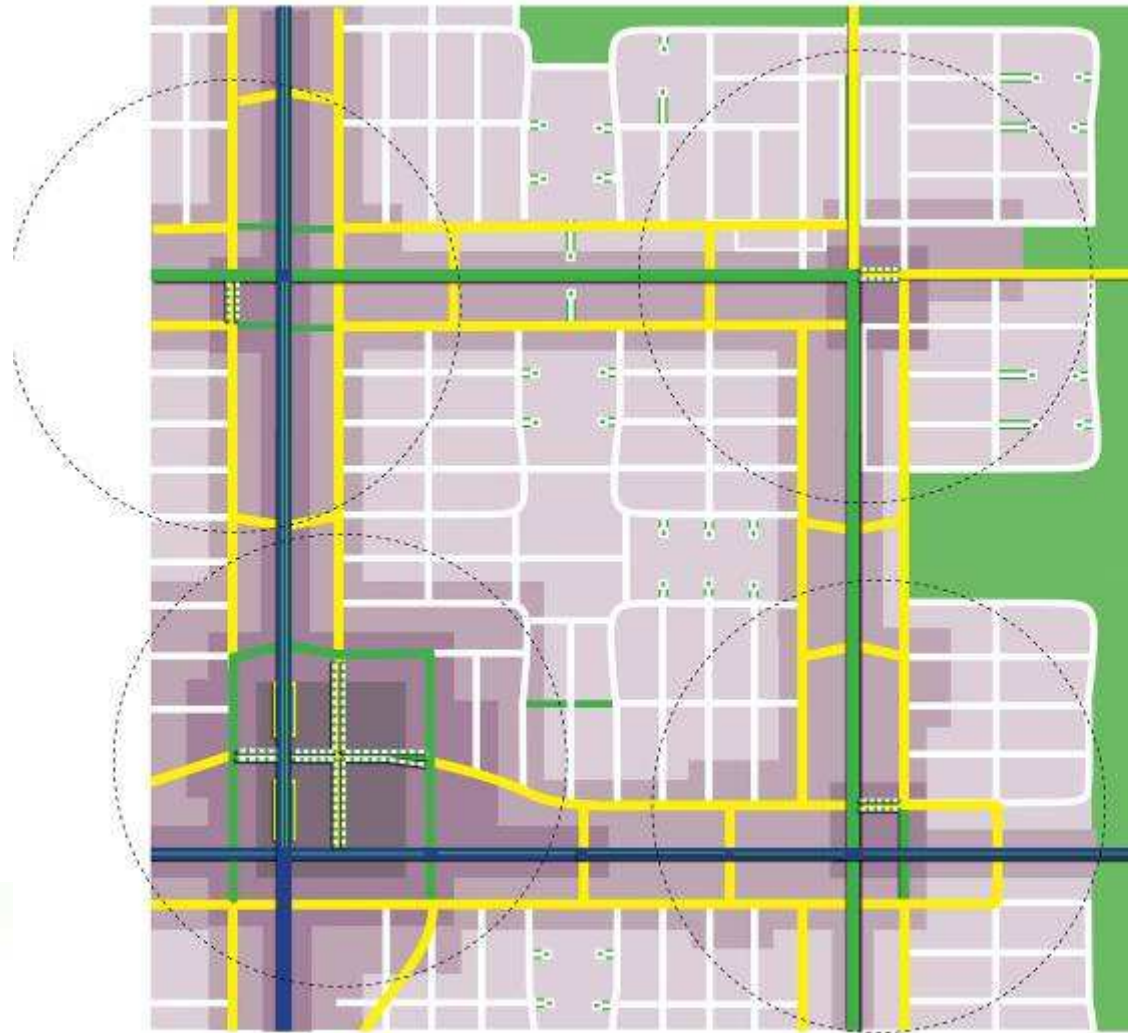


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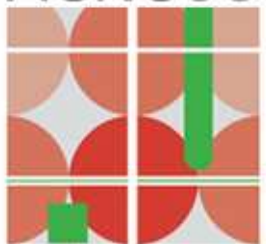


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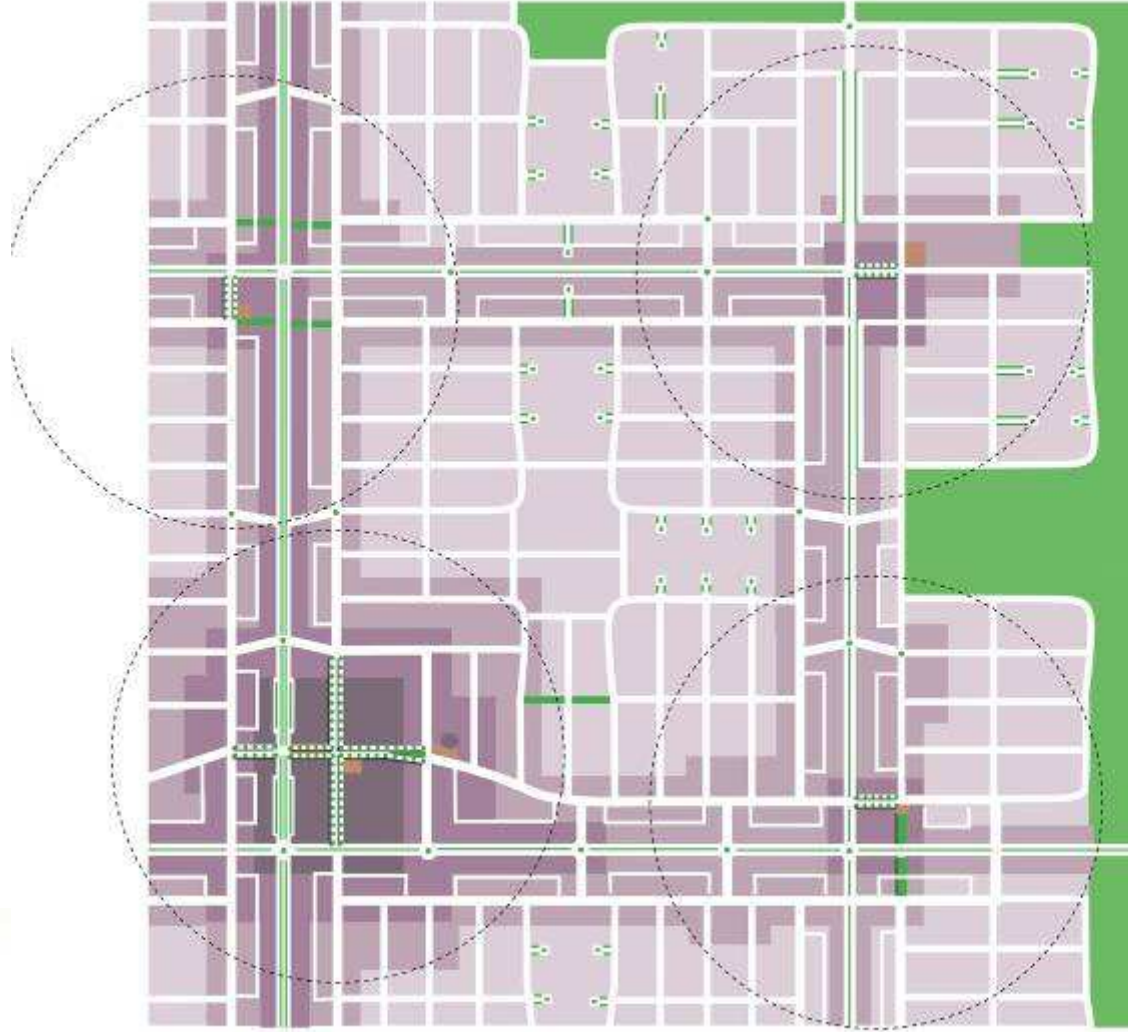


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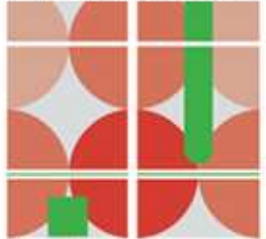


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Part 5

Street Typologies

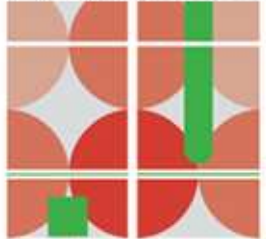


IMPLEMENTATION
GUIDELINE
No.17





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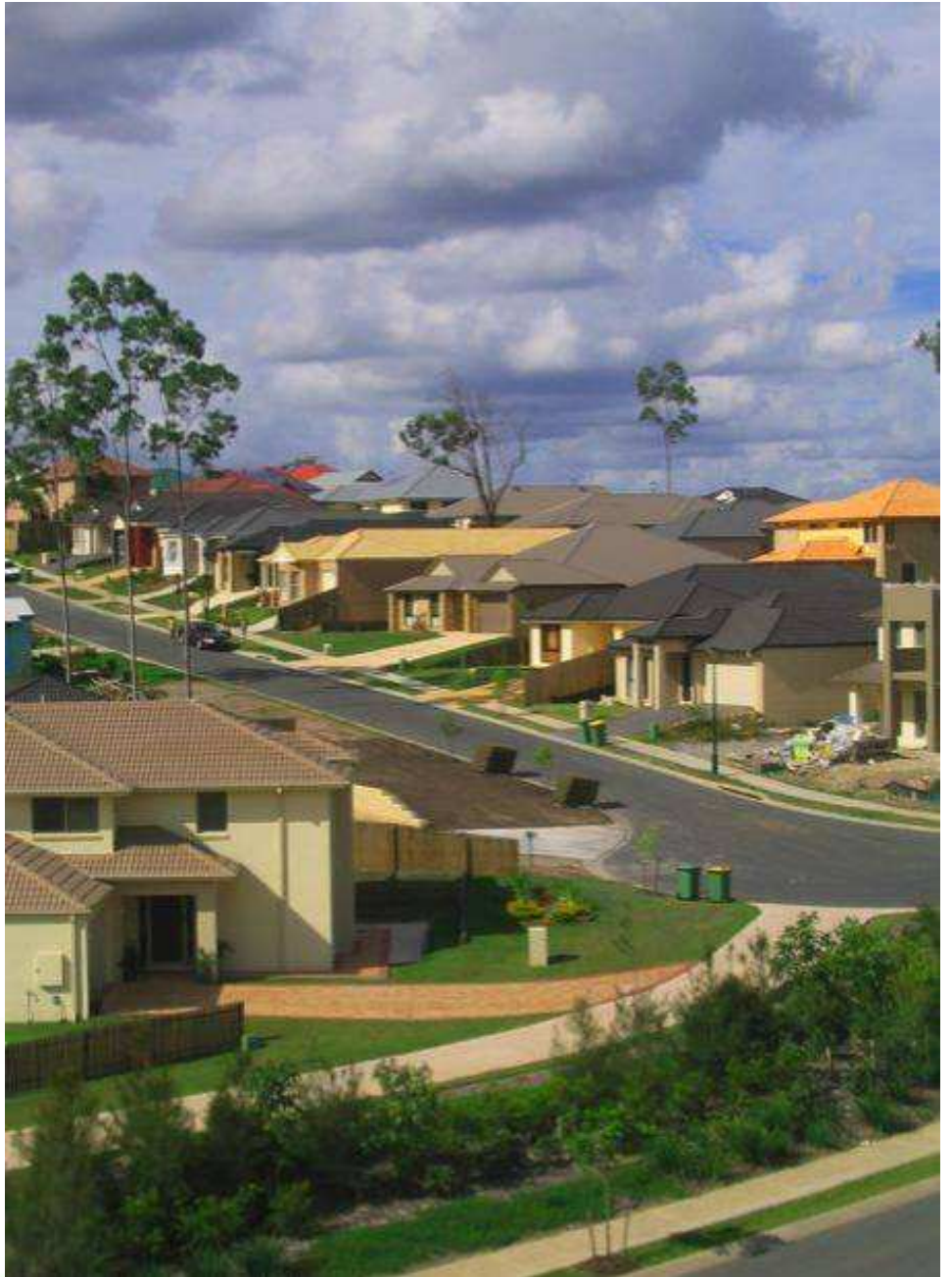


Brisbane

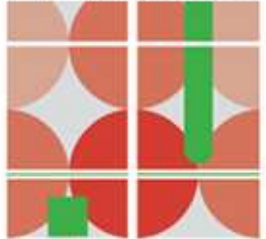
Springfield



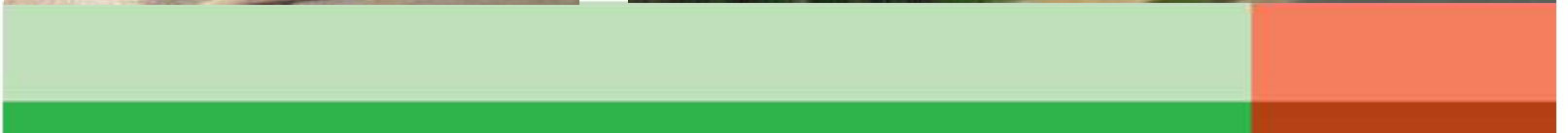
Springfield Lakes



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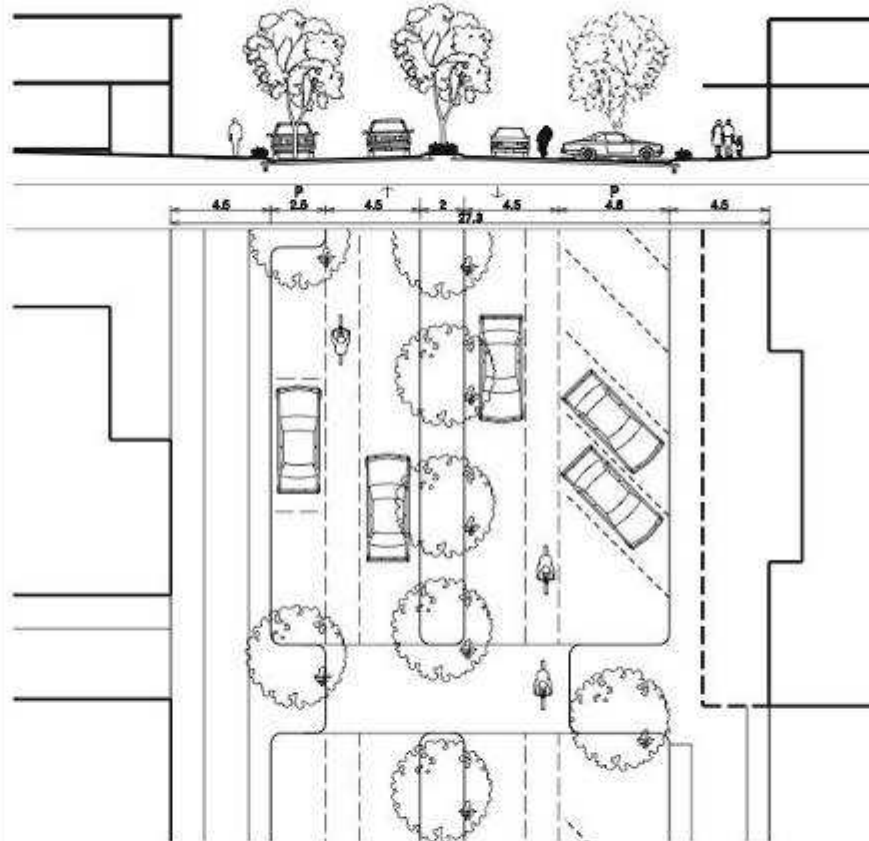
Neighbourhood Main Streets...



4.1.1 Neighbourhood Commercial Street (Dual Carriageway)

NOTES:

1. Appropriate for neighbourhood centres, local shops and commercial streets.
2. Intended to provide convenient access to premises and a safe, comfortable environment for pedestrians and cyclists.
3. Footpath or verge width may vary from 4.5-5.5m depending on intensity of commercial activity (e.g. outdoor dining). > 5.5m may be required to protect significant native vegetation or where topography requires latter.
4. Where a commercial street is intended to become a 'Main Street' a total design package is to be negotiated with Council, inclusive of:
 - roadworks (eg. travel lanes and parking areas);
 - landscaped treatments, paving and street furniture;
 - vehicle parking and loading areas;
 - public transport (eg. bus stop); and
 - building location and design.
5. Absolute minimum median width 2m. Desirable 4m. > 4m may be required to protect significant native vegetation or where topography requires latter.
6. Posted speed 50 km/h.
7. Bicycle lanes to be linemarked when linking to similar lanes at each end of neighbourhood commercial street.



A Safe Place
An Active Public Realm
A Place of Mobility
& Connectivity

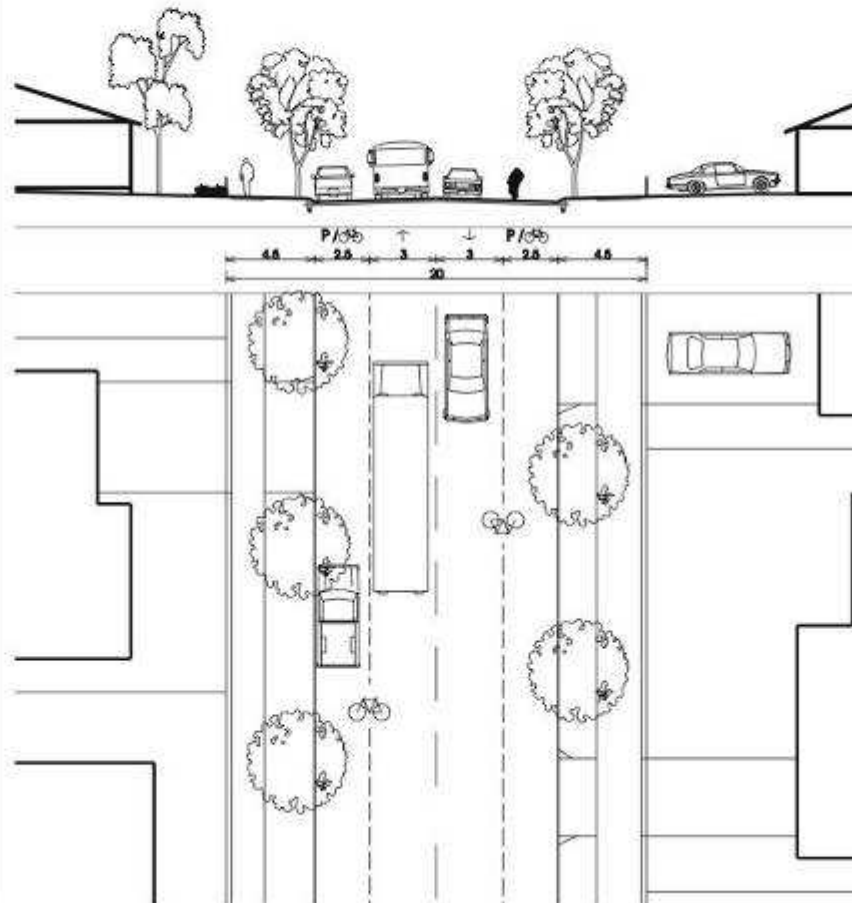


High volume connector (collector) streets with frontage...

4.1.6 Access Trunk Collector Street

NOTES:

1. Appropriate for Trunk Collector Streets where residential frontage is desired to activate the street.
2. No residential driveways > 7500yds. Residential frontage may still be achieved using rear-loaded dwellings. Limited driveway access to integrated residential developments may be acceptable.
3. Design Speed 60 km/h. Posted speed 60km/h. Safe Intersection Sight Distance based on 60 km/h must be achieved at all intersections.
4. Number and location of driveways controlled by one or more of the following methods:
 - access from rear lane or street;
 - access from side street or barrier;
 - angled driveways;
 - minimum driveway spacing;
 - minimum off street parking requirement;
 - minimum lot width or lot size; and
 - shared driveways.
5. Absolute minimum verge width 4m. > 4.5m may be required to protect significant native vegetation or where topography requires barriers.
6. Bus stops to be provided at a maximum of 800m intervals (desirable 400m) on both sides of street. Bus stops to be located within 2.5m parking / cycle lanes.



A Safe Place
An Active Public Realm
A Place of Mobility and
Connectivity



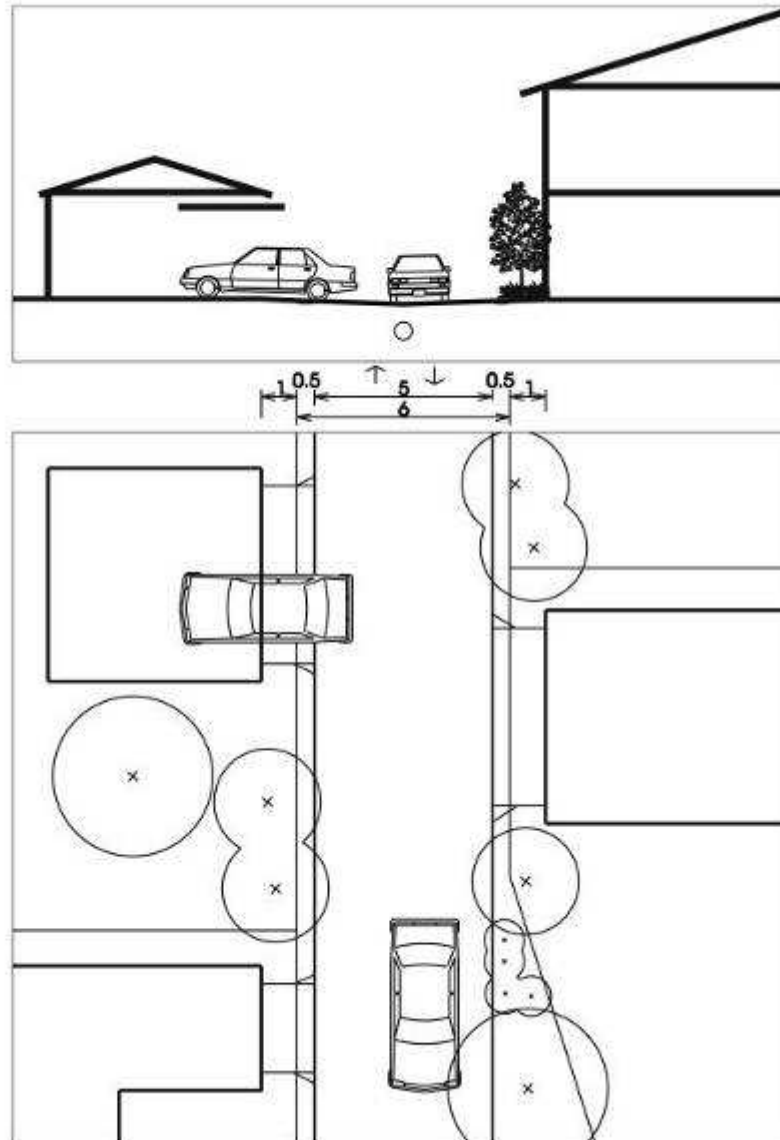
Rear Lanes...



4.1.14 Rear Lane

NOTES:

1. Garage access for rear - loaded housing.
2. 100 vehicles per day.
3. Desirable max length of 100m between exit points.
4. Shared Zone, no footpath.
5. Max Design Speed 20km/h.
6. Design should maximise habitable rooms overlooking lane for casual surveillance both within the rear lane itself and at ends of lane. Habitable rooms over garages within lane are encouraged to increase casual surveillance.
7. Preferred central V-drain. One-way crossfall with kerb and channel an alternative. *Rosewater* connections where necessary.
8. Preferred feature concrete finish rather than a.c.
9. Preference for rear lane to be elevated slightly above street network.
10. Design must ensure ability to enter garage.
11. Rear lane to be lit.
12. Additional reserve width is desirable at intervals and at entry points to allow for landscaping. Alternatively, landscaping may be provided within properties to soften built form of lane.



SPRINGFIELD LAKES
DESIGN MANUAL

An Integrated Place
A Safe Place

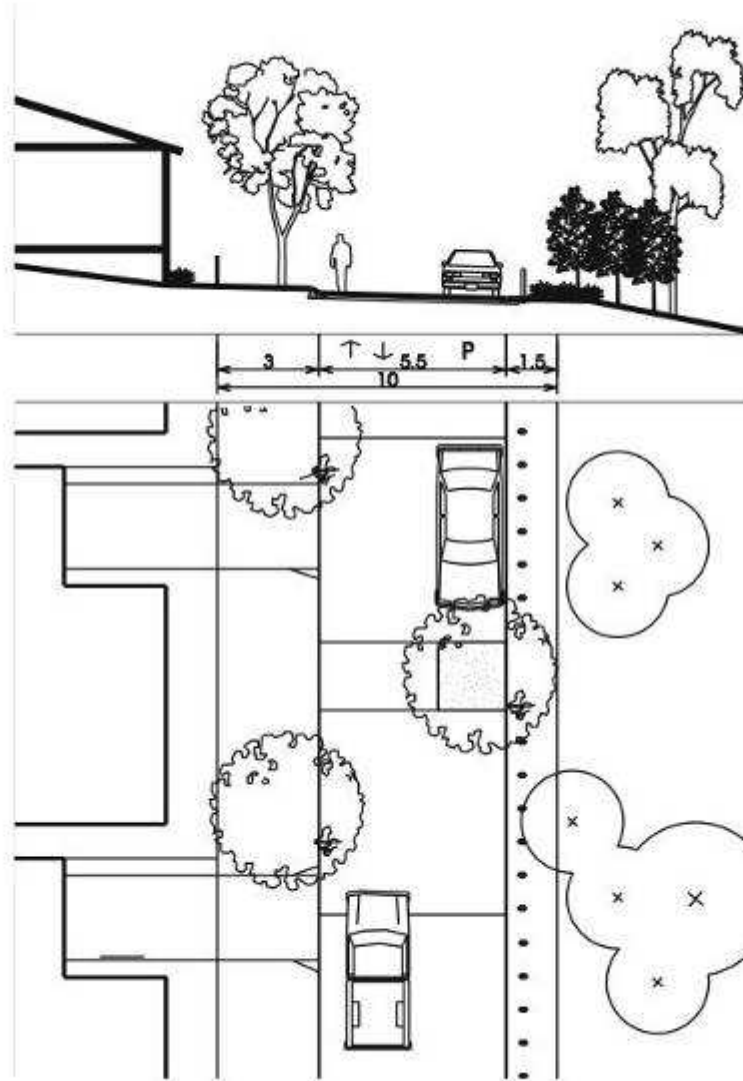


Minor Street Types e.g. Parkfront Lanes...

4.1.13 Parkfront Lane

NOTES:

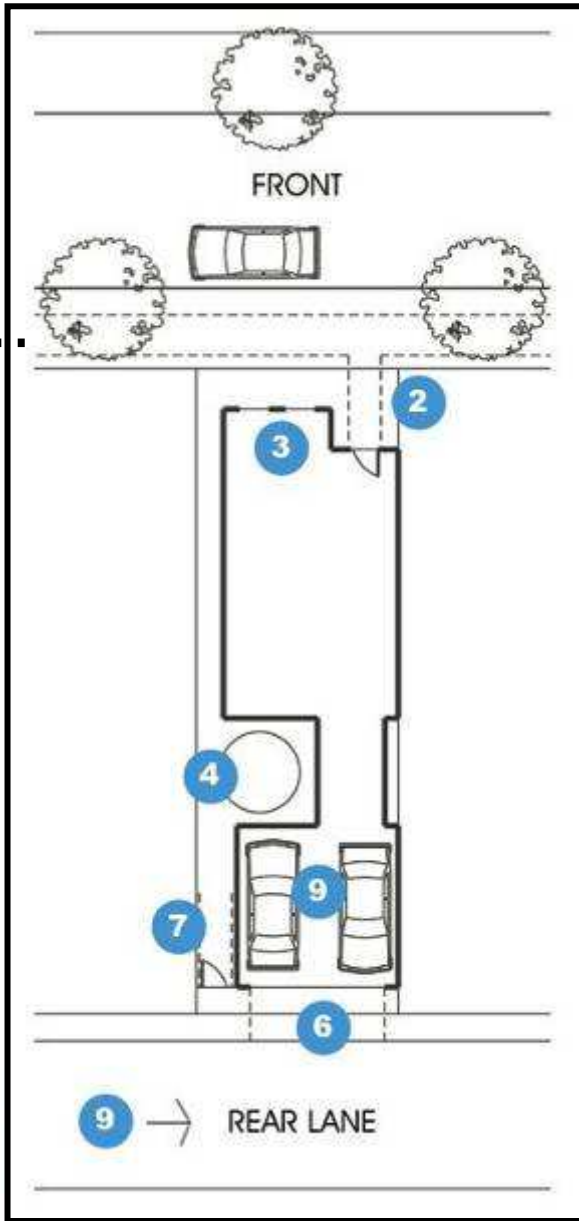
1. 100 vehicles per day.
2. Desirable max length of 100m between exit points.
3. Street Zone, no footpath.
4. Max Design Speed 20km/h for pedestrian & cyclist safety.
5. Drains to park; flush or slotted kerb where practical.
6. Creates amenity, pedestrian connectivity, and opportunity for social use of street.
7. Preferred feature concrete finish rather than a.c.
8. Design should maximise habitable rooms overlooking lane for casual surveillance.
9. Not to be used as primary (i.e. min 50% frontage to any recreation parks or sports grounds).



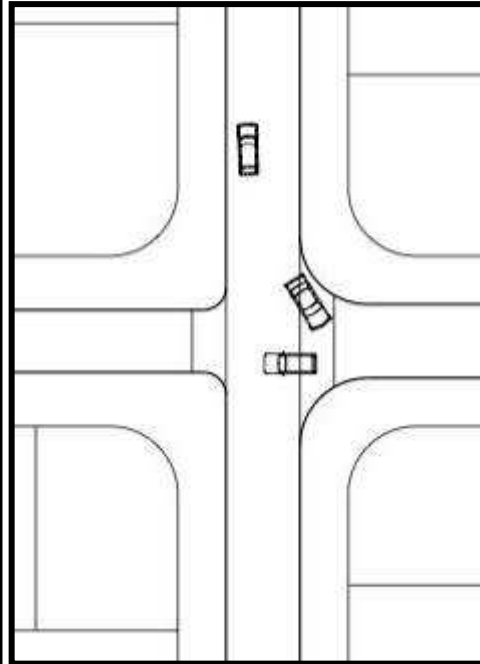
An Active Public Realm
A Safe Place



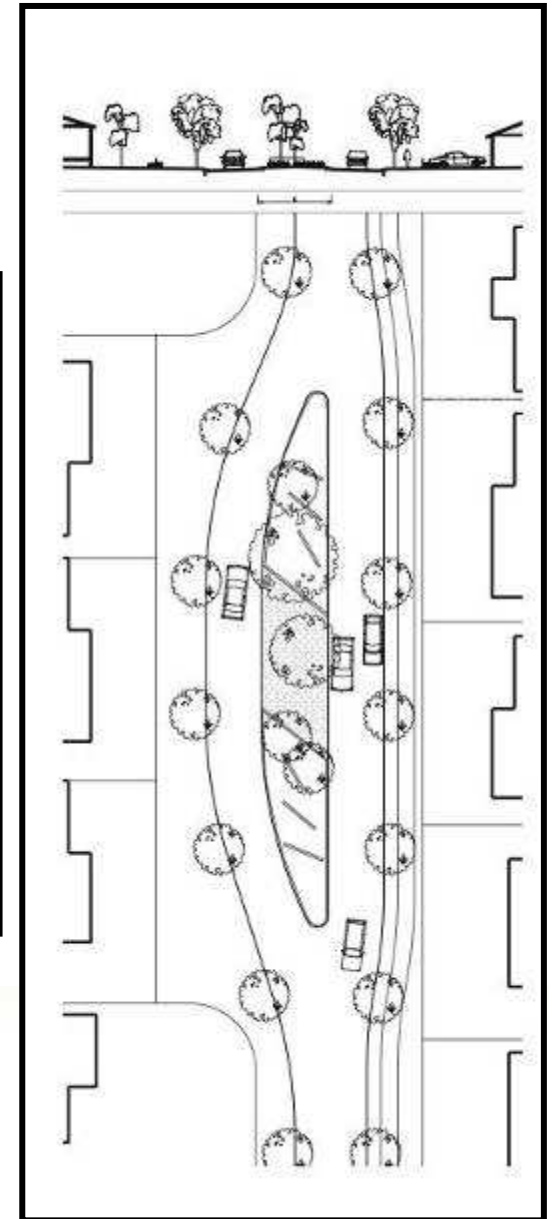
Built
Form...



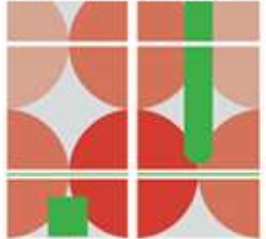
4-ways...



Landscapes...



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Learnings

- Norms are useful
- Collaborate
- Users will “dip” into manual
- Set principles to overcome entrenched positions

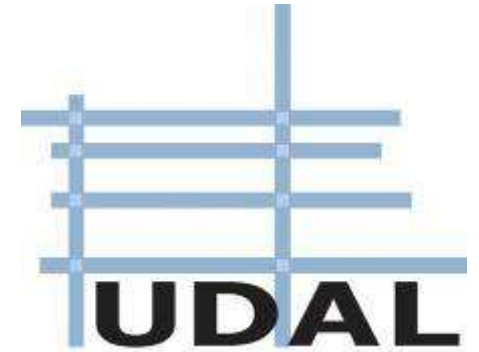


Part 6

Where to from here?

UDAL Q Forum

- 60 people
- IPWEA
- Ways forward?
 - Increase number of street solutions
 - Revise Hierarchy
 - Prioritise non-car Users



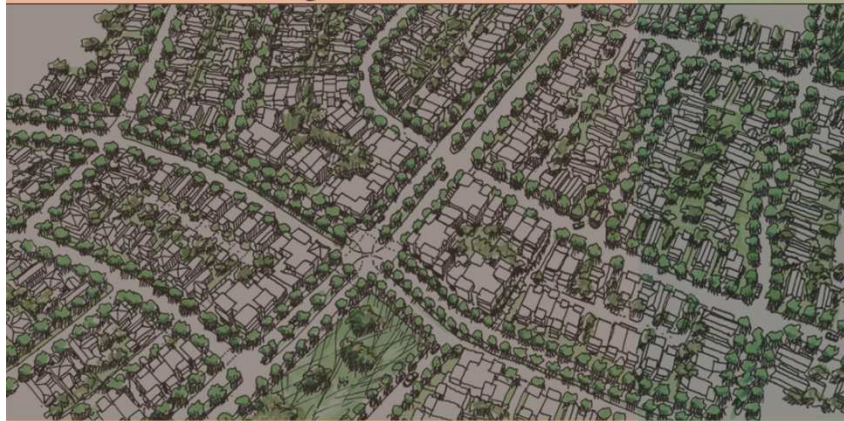
Conclusions

- There remains a place for a technical design guideline – Queensland Streets
- 2008 is time for an update
- Include New Urbanism principles
- Increase number of “standard” solutions
- Collaboration required between disciplines
- Leadership needed from industry, government and professional bodies

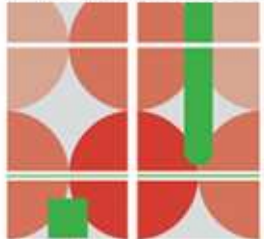
New

QUEENSLAND STREETS

*Design Guidelines for
Neighbourhoods and Towns*



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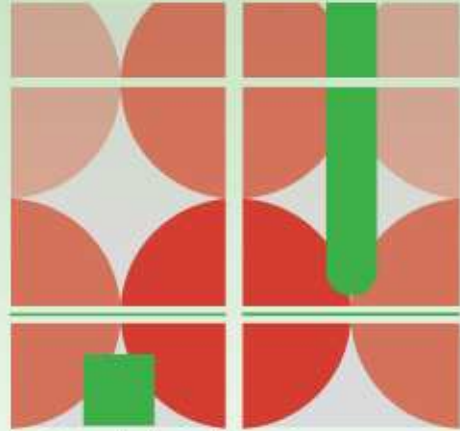
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**2008 NATIONAL
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FOR NEW URBANISM**

6th – 9th February, 2008

