

Council Agenda

10 April 2019

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city@busselton.wa.gov.au

CITY OF BUSSELTON

MEETING NOTICE AND AGENDA – 10 APRIL 2019

TO: THE MAYOR AND COUNCILLORS

NOTICE is given that a meeting of the Council will be held in the Council Chambers, Administration Building, Southern Drive, Busselton on Wednesday, 10 April 2019, commencing at 5.30pm.

Your attendance is respectfully requested.

DISCLAIMER

Statements or decisions made at Council meetings or briefings should not be relied on (or acted upon) by an applicant or any other person or entity until subsequent written notification has been given by or received from the City of Busselton. Without derogating from the generality of the above, approval of planning applications and building permits and acceptance of tenders and quotations will only become effective once written notice to that effect has been given to relevant parties. The City of Busselton expressly disclaims any liability for any loss arising from any person or body relying on any statement or decision made during a Council meeting or briefing.

MIKE ARCHER

CHIEF EXECUTIVE OFFICER

29 March 2019

CITY OF BUSSELTON

AGENDA FOR THE COUNCIL MEETING TO BE HELD ON 10 APRIL 2019

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1. DECLARATION OF OPENING AND ANNOUNCEMENT OF VISITORS

2. <u>ATTENDANCE</u>

Apologies

Approved Leave of Absence

Nil

- 3. PRAYER
- 4. APPLICATION FOR LEAVE OF ABSENCE
- 5. <u>DISCLOSURE OF INTERESTS</u>
- 6. ANNOUNCEMENTS WITHOUT DISCUSSION

Announcements by the Presiding Member

7. QUESTION TIME FOR PUBLIC

Response to Previous Questions Taken on Notice

Public Question Time For Public

8. **CONFIRMATION AND RECEIPT OF MINUTES**

Previous Council Meetings

8.1 Minutes of the Council Meeting held 27 March 2019

RECOMMENDATION

That the Minutes of the Council Meeting held 27 March 2019 be confirmed as a true and correct record.

Committee Meetings

9. RECEIVING OF PETITIONS, PRESENTATIONS AND DEPUTATIONS

Petitions

Presentations

Deputations

- 10. QUESTIONS BY MEMBERS OF WHICH DUE NOTICE HAS BEEN GIVEN (WITHOUT DISCUSSION)
- 11. ITEMS BROUGHT FORWARD FOR THE CONVENIENCE OF THOSE IN THE PUBLIC GALLERY
- 12. REPORTS OF COMMITTEE

Nil

13. PLANNING AND DEVELOPMENT SERVICES REPORT

13.1 WESTERN RINGTAIL POSSUM WORKING GROUP DIRECTIONS PAPER AND CONSIDERATION
OF ADOPTION FOR PUBLIC CONSULTATION OF PROPOSED AMENDMENT 42 TO LOCAL
PLANNING SCHEME 21 ('WESTERN RINGTAIL POSSUM HABITAT PROTECTION' SPECIAL
CONTROL AREA)

SUBJECT INDEX: Town Planning Scheme Amendments

STRATEGIC OBJECTIVE: Development is managed sustainably and our environment valued.

BUSINESS UNIT: Strategic Planning and Environmental Services

ACTIVITY UNIT: Strategic Planning

REPORTING OFFICER: Strategic Planner - Stephanie Navarro

Senior Natural Resource Management / Environment Officer - Will

Oldfield

AUTHORISING OFFICER: Director, Planning and Development Services - Paul Needham

VOTING REQUIREMENT: Simple Majority

ATTACHMENTS: Attachment A Western Ringtail Possum Working Group Directions

Paper <u>U</u>

Attachment B Final Council report for Amendment 146 to Town

Planning Scheme No. 20 !

Attachment C Proposed Special Control Area

PRÉCIS

The Council is asked to consider adopting the Western Ringtail Possum (WRP) Working Group (WRPWG) Directions Paper (Directions Paper) for the purposes of further consultation.

It is also requested that the Council consider initiating for public consultation proposed Amendment 42 (the Amendment) to *Local Planning Scheme No. 21* (the Scheme). The Amendment seeks to introduce a 'Western Ringtail Possum Habitat Protection Special Control Area' (SCA) into the Scheme. The Amendment is necessary to implement initiatives 1-3 of the Directions Paper. It is proposed that a new local planning policy will be prepared at a later stage to supplement and provide further guidance on the implementation of the SCA.

BACKGROUND

At its meeting of 10 May 2017, the Council resolved -

That the Council support the formation by the CEO of a 'Western Ringtail Possum Working Group', with the membership and role of the Group to be as follows –

- 1. Membership Interested Councillors and relevant staff; and
- 2. Role
 - a) Researching and receiving briefings from stakeholders on WRP issues;
 - b) Forming a view on what the City's role and approach to WRP issues should be, both in terms of actions by the City itself, but also in terms of advocating for action at State and/or Federal level; and
 - c) Briefing and seeking Council support for the Group's findings and proposed direction.

Subsequently, the WRPWG was formed and discussions were held with key stakeholders. The Directions Paper was subsequently developed (Attachment A). The WRPWG key findings are set out in the Directions Paper as follows -

- 1. Habitat in and around the Busselton and Dunsborough urban areas is likely to be important to the future survival of WRP as a species.
- 2. Whilst WRP do feed on other plant species, mature WA Peppermint trees (Agonis Flexuosa) are important for providing food and shelter for WRP.
- 3. The current approach to protection and enhancement of WRP habitat; both in City of Busselton managed reserves and private land is clearly insufficient to protect against degradation through clearing and development in a way that will critically affect the chances of WRP surviving on the Busselton Dunsborough coastal strip.
- 4. Whilst many in the community appreciate and value WRP in the urban environment, WRP can often be perceived as a nuisance by some residents, and their conservation status and the importance of their urban habitat is underappreciated by some in the community. Because of this, there could be significant conservation benefits in further community engagement, especially in relation to dog and cat managements, and approaches to garden, street and reserve vegetation management.
- 5. There is excellent work being done by agencies and volunteers / volunteer organisations which should be given greater recognition and appreciation. The work needs to continue, but the level and nature of the current efforts are insufficient to ensure the future survival of WRP as a species.
- 6. There appears to be a broad understanding of the factors contributing to the decline of WRP, but there needs to be continuing research investment, and especially further research into WRP populations within the context of the diverse range of ecosystems and habitats utilised in urban areas by this species.
- 7. The WRPWG is supportive of the Western Ringtail Possum Recovery Plan, but there is a need for greater impetus, resources and strategic focus at all levels of government to ensure the survival of WRP as a species beyond the short to medium term.

The WRPWG identified a proposed direction and a range of initiatives that, together, it considered could significantly assist in supporting the long-term survival of the WRP in urban areas of the City. The initiatives in the Directions Paper are spilt into seven key categories —

- 1. Habitat protection.
- 2. Habitat enhancement & expansion.
- 3. Community engagement & education.
- 4. Dog, cat & feral animal management.
- 5. Rehabilitation and new populations.
- 6. Research & monitoring.
- 7. Governance, funding & partnerships.

The Amendment seeks to implement initiatives 1 – 3 of the Directions Paper, which are as follows -

1: Introduce additional controls on the clearing of Western Ringtail Possum habitat in urban areas, including small-scale clearing. (Federal, State and Local)

- 2: Consider introduction of incentives to encourage retention of Western Ringtail Possum habitat in urban areas. (Federal, State and Local)
- 3: Develop a pro-active offset planting programme, which allows for recognition of offset planting undertaken prior to seeking environmental approvals, the pooling of resources, and the meeting of offset planting requirements through a 'cash-in-lieu' system. (Federal, State and Local)

It should be noted that the State Department of Biodiversity, Conservation and Attractions (DBCA), together with the Federal Department of the Environment and Energy (DEE), and other stakeholders (such as local government authorities, community groups and environmental NGOs), have developed a 'WRP Recovery Plan'. The success of the recovery plan is likely to depend on a broad response, involving all levels of government, multiple agencies, the community and industry. Because of the prevalence and importance of habitat in the City, the City and our community are significant stakeholders. DBCA has also tended to focus on 'natural' habitat areas, when the Directions Paper focuses on urban WRP habitats.

The City previously initiated a somewhat similar amendment to that now proposed. Amendment 146 to Town Planning Scheme No. 20 was initiated on 25 May 2011 and proposed to introduce a 'Western Ringtail Possum Habitat Protection Special Control Area', required offset planting where habitat was removed and included density bonuses where development was proposed which retained 'significant habitat'. Amendment 146 was subsequently advertised and final approval was supported by the Council on 12 December 2013. A copy of the report considered by the Council at that time is provided at Attachment B. Amendment 146 was then forwarded to the WAPC and the then Minister for Planning, who refused to grant final approval of the Amendment for the following reasons:

- (i) The WAPC does not support provisions which would effectively 'up-code' individual development sites, beyond that which could be achieved under the prescribed R-Code. Such an approach would be contrary to the expectations of the local community and inconsistent with orderly planning.
- (ii) The provisions have a primary focus on cash or planting offsets rather than mechanisms to ensure flexible application of development standards to achieve colocation of habitat trees and development on the same site.
- (iii) Provision 6(b) would appear to incentivise the removal of vegetation, contrary to the intent of the provisions.
- (iv) The modifications necessary to suitably amend the proposal would be time consuming, may warrant advertisement of the Amendment and as such would jeopardise the timely introduction of Scheme 21.
- (v) The proposed provisions are unnecessarily complex and would be subject to misinterpretation by the community.

Prior to progressing the Amendment, the City undertook informal consultation with the offices of the current Ministers for Planning and Environment. Whilst neither Minister is able to make a decision unless and until a formal proposal is presented to them, there were informal indications of a willingness to consider proposals such as the Amendment now proposed.

STATUTORY ENVIRONMENT

The key statutory instruments with respect to the Amendment are set out in the Scheme and the *Planning and Development Act 2005* as well as various environmental laws. Each is discussed below under appropriate subheadings.

Planning and Development Act 2005

The *Planning and Development Act 2005* outlines the relevant considerations when preparing and amending local planning schemes. The relevant provisions of the Act have been taken into account in preparing the Amendment.

Planning and Development (Local Planning Schemes) Regulations 2015

The *Planning and Development (Local Planning Schemes) Regulations 2015*, which came into operational effect on 19 October 2015, identifies three different levels of amendments – basic, standard and complex. The resolution of the local government is to specify the level of the Amendment and provide an explanation justifying this choice. This Amendment is considered to be a 'complex' amendment for the reason outlined in the 'Officer Recommendation' of this report.

Commonwealth Environmental Protection and Biodiversity Conservation Act 1999 ('EPBC Act')

The Commonwealth Department of Environment recently elevated the status of WRP from 'Vulnerable' to 'Endangered' and, last year, to 'Critically Endangered'. The EPBC Act protects WRP habitat but is limited in its application to clearing controls which can have a "significant impact" on habitat environment. This term is not defined in the Act, however, the Significant Impact Guidelines for the Western Ringtail Possum (Pseudocheirus occidentalis) in the Southern Swan Coastal Plain, Western Australia' does provide guidance on this matter. Most small-scale clearing in urban areas is not regulated under the EPBC Act.

State Environmental Protection Act 1986 ('EP Act') and associated regulations

The EP Act provides a legal framework for the State Government to protect the environment and regulate pollution. It sets out a range of different processes for doing this, including environmental impact assessments for planning scheme amendments and development proposals with the potential to cause significant environmental impact; as well as a permit system regulating the clearing of native vegetation. For the purposes of this report, the most important application of the EP Act is the clearing permit system. The EP Act is also supplemented by a number of environmental protection policies and subsidiary legislation, including the 'Clearing Regulations.'

The Clearing Regulations have the effect that, unless specifically exempted, a permit is required for the clearing or disruption of native vegetation (including, in many instances, regrowth, or 'intentionally planted vegetation'). There are no exemptions provided within identified Environmentally Sensitive Areas ('ESA') pursuant to the EP Act. This includes Conservation Category Wetlands (CCW) and the associated buffers and vegetation containing Threatened Ecological Communities (TER) or Declared Rare Flora (DRF). Much of the City, including most of the urban area, however, is located outside an ESA. As such, clearing may be exempt from the need to obtain a permit, for purposes that include –

- development of approved buildings;
- establishment of fences;
- collection of firewood for personal use by a landowner; or
- fire and emergency management.

With the exception of the last of these, exempted clearing is up to 1.0 hectare per year per property and, as such, permits are not required for most (usually small scale) clearing of habitat within urban areas.

State Biodiversity Conservation Act 2016 ('BC Act')

The BC Act began coming into practical effect from 1 January 2019, replacing the *Wildlife Conservation Act 1950*. The BC Act introduces new provisions for important biodiversity conservation matters that were not recognised in the Wildlife Conservation Act, such as new protections for habitat critical to the survival of a Threatened Species (including habitat conservation notices). Orders necessary to use those powers have, however, not yet been developed. As such, like its predecessor, the BC Act at present 'protects the animal, but not its home'.

RELEVANT PLANS AND POLICIES

The key plans and policies relevant to the proposal are as follows -

- 1. City of Busselton Environment Strategy 2016-21.
- 2. Draft City of Busselton Local Planning Strategy.
- 3. State Planning Policy 2 Environment and Natural Resources Policy.
- 4. State Planning Policy 3.1 The Residential Design Codes of WA (R-Codes).

City of Busselton Environment Strategy 2016-21

The City's Environment Strategy 2016-21 supports both the Amendment and the implementation of the Directions Paper. The Strategy provides direction on how the City will meet the environmental aspirations set out in the Strategic Community Plan and guide the City's future activities in environmental management and sustainability. The strategy includes a number of strategic actions relating directly to the Direction Paper and Amendment, as follows -

- "1.2 Continue improvement of planning mechanisms for the protection of biodiversity and habitat. Review and finalise the draft Western Ringtail Possum Habitat Protection and Enhancement Strategy.
- 1.3 Work in partnership with other agencies and organisations to identify opportunities for implementation of recovery plans for protection of endangered species."

Draft City of Busselton Local Planning Strategy (LPS)

The LPS broadly sets out the long-term planning direction for the whole of the District and provides the strategic rationale for decisions related to the progressive review and implementation of the Scheme. The LPS was submitted to the WAPC in late 2016 and is currently awaiting final approval. The LPS includes the following Theme, Objectives and Strategies that are applicable to the Directions Paper and Amendment, as follows -

"Theme 4: Environment and Landscape' of the draft LPS includes the following objectives and strategies:

Objectives

a) Protect and enhance the natural environment and biodiversity of the District.
 Strategies

- a) Protect and enhance the habitat of native fauna, native vegetation and wetlands as part of the planning and development of the District.
- d) Support the long-term survival of the District's Western Ringtail Possum population, especially the population within urban areas."

State Planning Policy 2 – Environment and Natural Resources Policy (SPP2)

SPP2 must be given due regard by the WAPC and local government in the making of all planning decisions. SPP2 also sets out that planning schemes and decision-making should -

- "(iv) Protect significant natural...features, including sites and features significant as habitats...
- (x) Support conservation, protection and management of native remnant vegetation where possible to enhance...biodiversity, fauna habitat, landscape, amenity values and ecosystem function.
- (xi) Consider alternatives to land acquisition for conservation and landscape protection where limited or no public access is required..."

SPP2 sets out that planning strategies, schemes and decision-making should:

- "(i) Consider mechanisms to protect areas of high biodiversity and/or conservation value, including...
 - d. land containing...habitat to Threatened Fauna...
- (ii) Seek to avoid or minimise any adverse impacts, directly or indirectly, on areas of high biodiversity or conservation value as a result of changes in land use or development."

State Planning Policy 3.1 – The Residential Design Codes of WA (R-Codes)

The Scheme adopts the standards for residential development established in the Residential Design Codes of Western Australia (R-Codes) subject to the modifications specified in Clause 4.3 of the Scheme. The incentive provisions referred to in this Amendment allow for consideration of discretions to the deemed-to-comply criteria of certain design elements of the R-Codes.

FINANCIAL IMPLICATIONS

Financial implications associated with this report relate only to the advertising and consultation of the Directions Paper and the Amendment.

LONG-TERM FINANCIAL PLAN IMPLICATIONS

In terms of the broader recommendations of the Directions Paper, many of the actions can be implemented without additional resources. However, there are a number of initiatives that require works on the ground, such as -

- street and reserve tree planting;
- conversion of under-utilised parkland into areas with improved habitat functions;
- installation of rope bridges across roads where there are known frequent crossings by WRP, or where habitat corridors are being created;
- establishment of strategic habitat and corridor linkages;

- expansion of fox and feral cat control programs on City reserved lands, and actively promoting control activities on adjoining private land; and
- undertaking a base survey of possum populations and developing a monitoring programme to gauge the overall success of possum recovery and enhancement (in conjunction with a university or DBCA).

These activities may require additional funding, both City funds and/or in conjunction with external funding sources and will need to be budgeted for in the future at the time of their implementation. In substantial part, however, these things could be achieved by changing existing practices, rather than through net additional effort or resources.

In relation to the implementation of the Amendment, officers are generally of the view that implementation of the proposed provisions would not involve significant additional workload but this would need to be assessed over time.

STRATEGIC COMMUNITY OBJECTIVES

Both the proposed Amendment and Directions Paper will serve to deliver the following community objectives of the Strategic Community Plan:

Key Goal Area 3 – Environment:

- 3.1 Development is managed sustainably and our environment valued.
- 3.2 Natural areas and habitats are cared for and enhanced for the enjoyment of current and future generations.

RISK ASSESSMENT

An assessment of the potential implications of implementing the officer recommendation has been undertaken using the City's risk assessment framework. The assessment identified 'downside' risks only, rather than upside risks as well. The implementation of the officer recommendation will involve initiating the proposed Amendment for referral to the WAPC and the EPA and subsequent consultation. In this regard, there are no significant risks identified.

CONSULTATION

Consultation to date

During development of the Directions Paper, the City consulted with relevant stakeholders including representatives of the following agencies and groups—

- Federal Department of the Environment and Energy.
- State Department of Biodiversity, Conservation and Attractions.
- State Department of Planning, Lands and Heritage.
- South West Catchments Council.
- GeoCatch (Geographe Catchment Council) Western Ringtail Possum Action Group (WRAG).
- Nature Conservation Margaret River Region (formerly Cape to Cape Catchments Council).
- Busselton-Dunsborough Environment Centre.
- Busselton Naturalists' Club.
- Fostering and Assistance for Wildlife Needing Aid (FAWNA).
- Western Ringtail Possums R'us.
- Dunsborough Coast and Landcare.
- Busselton veterinary practices.

Information gathered from briefings provided by the above mentioned groups and agencies has been considered in the development of the Direction Paper and the Amendment.

Proposed consultation

If the Council resolves to initiate this Amendment, it will be considered a 'complex' amendment. This Amendment is considered to be 'complex' as it is "an amendment that is not addressed by any local planning strategy". The Amendment would be forwarded to the WAPC within 21 days of the Council's resolution for its consent to advertise.

Following consent to advertise from the Commission, the related documentation would be referred to the EPA to consider the need for formal review under Part 4 of the *Environmental Protection Act* 1986. If the EPA determines that formal review is unnecessary, the Amendment would be advertised for a period of 60 days and include referral to relevant state government agencies. In the event that the EPA determines that the proposal is to be formally reviewed, the City shall cause such review to be undertaken in accordance with s82 of the *Planning and Development Act 2005*.

Advertising and consultation would likely consist of -

- notices in local newspapers on at least two occasions;
- the display of a copy of the notice in the offices of the City for the period set out in the notice;
- providing a copy of the notice to each public authority that the City considers is likely to be affected by the Amendment;
- the publishing of a copy of the notice and the Amendment on the website of the City;
 and
- the advertising of the Amendment as directed by the Commission and in any other way the City considers appropriate.

In addition to the above it is proposed that additional consultation occur, including:

- FAQ document;
- a media release;
- community information session(s) to be coordinated (and advertised) during the consultation period; and
- consultation with other key stakeholders as may be identified.

The proposed Amendment would then need to be re-considered by the Council in light of any submissions received prior to its subsequent determination and forwarding for consideration by the WAPC and Minister for Planning.

OFFICER COMMENT

The two key actions proposed in this report are to -

- Adopt the Directions Paper and commence the process of implementing some of the initiatives contained within; and
- Initiate the Amendment.

Each of these is briefly discussed below.

Directions Paper

The Directions Paper contains 34 recommended initiatives that, if undertaken, would influence the protection and enhancement of WRP habitat and welfare of the species.

These initiatives include actions that:

- the City can take itself;
- could occur in constructive partnership with other agencies and / or groups; and/or
- would require State and /or Federal Government leadership or support.

In many cases, the City would be working with other stakeholders to improve overall outcomes, including those groups mentioned in the 'Consultation' section of this report. The City would advocate for, and seek to implement, the initiatives contained within the Directions Paper.it is seen as appropriate that further consultation is undertaken before the Directions Paper is adopted in final formal and more broadly implemented.

Amendment

A key role for the City arising from the Directions Paper is the protection of WRP habitat on private land, particularly in the urban areas of Busselton and Dunsborough. Through this Amendment it is proposed to introduce the SCA. The SCA would overcome deficits in the current clearing controls and the area included within the SCA has been based on the Significant Impact Guidelines for the Western Ringtail Possum (Pseudocheirus occidentalis) in the Southern Swan Coastal Plain, Western Australia. These guidelines identify important habitat and feeding areas for the WRP and divides these areas into three categories being "Core Habitat", "Primary Corridors" and "Supporting Habitat." It is noted that "Core Habitat" and "Primary Corridor" areas are centralised around the residential areas of Busselton and along the coast between Dunsborough and Busselton where there are currently no controls on the removal of vegetation.

The SCA would in effect require development approval for the removal of a single mature tree or more. The SCA will not prohibit clearing or development, however it, would enable the City to introduce incentives to assist with and encourage the retention of trees in urban areas. In addition, the proposed offset requirements, where clearing is approved, will allow the City to establish a pooled and proactive offset programme which the City may strategical implement to increase WRP habitat in urban areas of the City.

Some areas indicated as important areas for the WRP within the guidelines have been excluded from the SCA. Residential areas with R-code density of less than R10 and newer residential subdivisions have been excluded for the reasons as follows -

- Residential areas with R-code density of less than R10. These areas have been excluded
 as there are already requirements in the Scheme that necessitate development
 applications being submitted and approved prior to the removal of vegetation.
- Newer Residential subdivisions including Vasse, Dunsborough Lakes and Old Broadwater Farm. These areas are generally devoid of well-established native trees. Where approvals were required for clearing as part of the subdivision process, these were obtained from the necessary agencies. It is therefore considered that, currently, there is no requirement for these areas to be included within 'Western Ringtail Possum Habitat Protection Areas.' However, this may be reviewed in the future once vegetation has become better established.

The Amendment proposes to require a development application be submitted and approved if clearing would meet the following criteria -

- (a) the extent of clearing in any 12 month period exceeds a contiguous canopy area of 50m²;
- (b) the tree has a single trunk with a diameter of greater than 100mm when measured 1m above ground level; and/or
- (c) the trees has two or more trunks and the sum of their individual diameter is 200mm or more when measured 1m above ground level.

The proposed criteria has been developed with the intention of allowing the removal of small individual trees and/or pruning without requiring a development approval however will capture the removal of a single mature tree or greater. It is proposed that the maximum area of canopy cover cleared before a development application is required would be determined cumulative over at 12 month period. This would prevent multiple rounds of small scale clearing and/or pruning over a short period and is consistent with the timeframe set under the clearing regulations for large scale clearing.

A local planning policy is proposed to be prepared to supplement the SCA and provide clarification on the assessment criteria for clearing which would require a development applications under these proposed provisions. In addition, the local planning policy would provide clarification regarding the types of trees (noting that whilst the SCA affects all trees, local planning policy could be used to exclude some trees from the effects of the controls) that will require approval before removal and will include criteria for offset planning when trees are removed. To encourage the retention of trees it is proposed that the local planning policy would include guidance regarding development incentives.

In terms of potential development incentives, the Amendment has been deliberately drafted to be very broad. Potential incentives could include permitting increases in density (either in terms of numbers of units or floorspace), increases in height, reduced setbacks or reduced parking provision. Given that one of the key WAPC concerns with the earlier Amendment 146, however, was in relation to the potential development incentives on offer, it is seen as possible that it may wish to better define potential incentives in the Scheme itself, rather than relying on local planning policy (which does not usually require WAPC approval) to do that.

It is possible that WAPC consent to advertise may be conditional on changes to the Amendment in this regard. If that were the case, officers would seek further guidance and direction from the Council before proceeding with advertising. Importantly, it is also expected that would result in more detail on potential incentives being available prior to community consultation, and if the WAPC decision does not result in that, officers would in any case seek further Council guidance on potential incentives before consultation is undertaken, as no doubt that would be an important consideration for many. Officers are, however, of the view that at this stage of the process it is best to start with a broad scope for potential incentives, rather than seeking to clearly define (and restrict) that potential at this stage.

CONCLUSION

Officers recommend that the Council endorse the Directions Paper and initiate the Amendment for the purposes of public consultation.

OPTIONS

Should the Council not support the Officer Recommendation, it could instead resolve –

- 1. To decline the request to initiate the proposed Amendment (and provide a reason for such a decision). It should be noted that under the relevant legislation there is no right of appeal against a Council decision not to initiate an amendment.
- 2. To seek further information before making a decision.
- 3. To initiate the proposed Amendment subject to further identified modification(s) as required.

Officer assessment has not revealed any substantive issue or reasonable grounds that would support any of these options.

TIMELINE FOR IMPLEMENTATION OF OFFICER RECOMMENDATION

Following Council's resolution, the Amendment will be forwarded to the WAPC seeking approval for advertising. Once consent is received the Amendment will be advertised as detailed in the 'Consultation' section of this report within 2 weeks.

OFFICER RECOMMENDATION

That the Council:

- 1. Adopt the Western Ringtail Possum Working Group Directions paper for the purposes of community consultation.
- 2. In pursuance of the *Planning and Development (Local Planning Schemes) Regulations 2015,* initiates Amendment 42 to the City of Busselton Local Planning Scheme 21 for the purposes of:
 - a) Amending the Scheme text by inserting a new Clause within 'Part 5 Special Control Areas' as follows:

"WESTERN RINGTAIL POSSUM HABITAT PROTECTION AREAS

- (1) This clause applies to all land shown on the Scheme Map as being within a "Western Ringtail Possum Habitat Protection Area."
- (2) Within "Western Ringtail Possum Habitat Protection Areas" no tree(s) shall be removed or cleared without the prior approval of the local government where;
 - (a) the extent of clearing in any 12 month period exceeds a contiguous canopy area of 50m²;
 - (b) the tree has a single trunk with a diameter of greater than 100mm when measured 1m above ground level; and/or
 - (c) the tree has two or more trunks and the sum of their individual diameter is 200mm or more when measured 1m above ground level;
- (3) Notwithstanding sub-clause (2), the clearing of vegetation that is dead, dying or poses an immediate threat to life or property is exempt from this requirement. The local government may require that the person that cleared the vegetation reasonably demonstrate that the clearing was necessary for this reason.
- (4) Proposed clearing of vegetation will be subject to assessment criteria as identified in a relevant local planning policy.

- (5) The local government may grant approval to remove trees within "Western Ringtail Possum Habitat Protection Areas" subject to conditions, including that:
 - (a) clearing shall be undertaken in accordance with adopted procedures and requirements; and
 - (b) offset planting shall occur on the subject site in accordance with adopted standards and requirements outlined by the local government; or
 - (c) an applicant may, in lieu of offset planting requirements pursuant to (b) above, make a financial contribution toward offset planting being undertaken by the local government.

Any such contribution shall be equivalent to the otherwise required offset planting and equal to the local government's estimated cost of undertaking that planting, including maintenance for two years after establishment.

The local government may only apply contributions received under this subclause for the purposes of the planting and enhancement of locally native vegetation in accordance with an adopted strategy.

(6) The local government may vary any site or development requirement specified in this Scheme to facilitate the preservation of trees within 'Western Ringtail Possum Habitat Protection Areas' provided that, in the opinion to the local government, after having undertaken such public consultation as the local government sees fit, any such variation of site or development requirements would not unduly prejudice the established character and amenity of that locality.

Where the local government may vary any site or development requirements the Local Government may by notice served upon individual landowners or upon a subdivider of land, require the preservation of a tree or group of trees. Thereafter no landowner shall cut, remove or otherwise destroy any tree unless the Local Government grants approval or rescinds the notice or order.

- b. Amending the Scheme Map by identifying 'Western Ringtail Possum Habitat Protection Areas' as illustrated at Attachment C.
- 3. That, as the draft Amendment is, in the opinion of the Council, consistent with Part V of the Act and Regulations made pursuant to the Act, that upon preparation of the necessary documentation, the draft Amendment be referred to the Environmental Protection Authority (EPA) as required by the Act, and on receipt of a response from the EPA indicating that the draft Amendment is to be subject to formal environmental assessment, be advertised for a period of 42 days, in accordance with the Planning and Development (Local Planning Schemes) Regulations 2015. In the event that the EPA determines that the draft Amendment is to be subject to formal environmental assessment, this assessment is to be prepared by the proponent prior to advertising of the draft Amendment.
- 4. Advises the Western Australian Planning Commission that the proposed Amendment is considered to be a 'complex' amendment pursuant to the *Planning and Development (Local Planning Scheme) Regulations 2015* for the following reason:
 - (b) The Amendment is not addressed by any local planning strategy.

Attachment A

CITY OF BUSSELTON

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WESTERN RINGTAIL POSSUM WORKING GROUP DIRECTIONS PAPER

By

CITY OF BUSSELTON WESTERN RINGTAIL POSSUM WORKING GROUP

March 2019

1.0 Background

The Western Ringtail Possum, *Pseudocheirus occidentalis*, is a species unique and endemic to the south west of Western Australia. Both the range and numbers of Western Ringtail Possum have reduced dramatically since European settlement, largely as a result of land clearing and other environmental change.

The Western Ringtail Possum is the fauna emblem of the City of Busselton, and is reasonably common in parts of the City, especially the older and relatively well vegetated parts of the Busselton and Dunsborough urban areas. The urban areas of Busselton and Dunsborough, in fact, form a significant proportion of the remaining 'Core' habitat for the species.

The conservation status of the Western Ringtail Possum has been upgraded in recent years from 'Vulnerable, to 'Endangered' and, last year, to 'Critically Endangered' (CE) by the State and the Commonwealth. CE is the highest conservation status before species are considered to be 'Extinct in the Wild' or 'Extinct'.

There has been a substantial amount of research undertaken into Western Ringtail Possum and their habitat, and there are a number of issues that we do not yet fully understand. Habitat in the urban areas of Busselton and Dunsborough is, however, particularly important because Western Ringtail Possum exist at substantially higher densities here than in many natural/forest environments. It is understood a key reason for that is that urban gardens and parks are well fertilised, and in particular are watered through the summer, thereby increasing the carrying capacity of the landscape and mitigating the effects of the drying climate.

The State Department of Biodiversity, Conservation and Attractions (DBCA), together with the Federal Department of the Environment and Energy, and other stakeholders (such as local government authorities, community groups and environmental NGOs), have developed a Western Ringtail Possum Recovery Plan. The success of the recovery plan is likely to depend on a broad response, involving all levels of government, multiple agencies, the community and industry. Because of the importance of habitat in the City, the City will need to be involved.

In early 2017, the Council formally recognised that further work and discussion is necessary to determine what the City's role and approach should be. The Council did that through resolving, in May 2017, to support formation of a 'Western Ringtail Possum Working Group' (WRPWG). The WRPWG was to consist of interested Councillors and relevant staff. The role of the WRPWG was identified as being –

- a) Researching and receiving briefings from stakeholders on Western Ringtail Possum issues;
- b) Forming a view on what the City's role and approach to Western Ringtail Possum issues should be, both in terms of actions by the City itself, but also in terms of advocating for action at State and/or Federal level; and
- c) Briefing and seeking Council support for the WRPWG's findings and proposed direction.

The membership of the WRPWG is and has been as follows –

- Councillor Rob Bennett (Chair);
- Councillor Ross Paine (Deputy Chair)
- Councillor Terry Best (until October 2017);
- Councillor Coralie Tarbotton (from October 2017);
- Paul Needham (Director, Planning & Development Services);
- Greg Simpson (Coordinator, Environmental Management); and
- Will Oldfield (Senior Environmental / Natural Resource Management Officer).

The WRPWG has received briefings from representatives of the following agencies and groups in undertaking its work –

- Federal Department of the Environment and Energy;
- State Department of Biodiversity, Conservation and Attractions;
- State Department of Planning, Lands and Heritage;
- South West Catchments Council;
- GeoCatch (Geographe Catchment Council) Western Ringtail Possum Action Group (WRAG);
- Nature Conservation Margaret River Region (formerly Cape to Cape Catchments Council);
- Busselton-Dunsborough Environment Centre;
- Busselton Naturalists' Club;
- Fostering and Assistance for Wildlife Needing Aid (FAWNA); and
- Western Ringtail Possums R'us.

The City also has a representative on the DBCA coordinated Western Ringtail Possum Recovery Team.

2.0 Key findings

The WRPWG's key findings are as follows -

- 1. Habitat in and around the Busselton and Dunsborough urban areas is likely to be important to the future survival of Western Ringtail Possum as a species.
- 2. Whilst Western Ringtail Possum do feed on other species, mature WA Peppermint trees (Agonis flexuosa) are important for providing food and shelter for Western Ringtail Possum.

- 3. The current approach to protection and enhancement of Western Ringtail Possum habitat (in City of Busselton managed reserves and private land) is clearly insufficient to be confident that it will not be significantly degraded through clearing and development in a way that will critically affect the chances of Western Ringtail Possum surviving on the Busselton Dunsborough coastal strip.
- 4. Whilst many in the community appreciate and value Western Ringtail Possum in the urban environment, Western Ringtail Possum can be perceived as problematic by some residents, and their conservation status and the importance of their urban habitat is underappreciated by some in the community. For example, there would be significant conservation benefits in further community engagement, especially in relation to: dog and cat management; and approaches to garden, street and reserve vegetation management.
- 5. There is a lot of excellent work being done by agencies and volunteers / volunteer organisations; work which should be given greater recognition and appreciation, and which needs to continue, but the level and nature of current effort is insufficient to ensure the future survival of Western Ringtail Possum as a species.
- 6. There appears to be a broad understanding of the factors leading to the decline of Western Ringtail Possum, but there needs to be continued research investment, and especially further research into Western Ringtail Possum populations within the context of the diverse range of ecosystems and habitats utilised by this species.
- 7. The WRPWG is supportive of the Western Ringtail Possum Recovery Plan, but there is a need for greater impetus, resources and strategic focus at all levels of government to ensure the survival of Western Ringtail Possum as a species beyond the short to medium term.

3.0 Proposed direction

The WRPWG has identified a number of initiatives that, together, could significantly assist in supporting the long-term survival of the Western Ringtail Possum. Those initiatives include both actions that the City can conceivably take itself, actions that could occur in partnership with other agencies and / or groups, as well as actions that would require State and /or Federal Government leadership or support. The initiatives have been split into seven key categories, as follows —

- 1. Habitat protection;
- 2. Habitat enhancement & expansion;
- 3. Community engagement & education;
- 4. Dog, cat & feral animal management;
- 5. Rehabilitation & new populations
- 6. Research & monitoring; and
- 7. Governance, funding & partnerships.

A description of each category, and the initiatives possible in each, is provided below.

3.1 Habitat protection

Western Ringtail Possum habitat can be lost or degraded in a number of ways, including through clearing of vegetation, through fire management practices, as well as through climate change, especially the general drying of the climate in the south west of Western Australia in recent decades. The focus here is on vegetation clearing in urban areas.

There are a range of controls on clearing at present, which may be summarised as follows –

- At the local level, there are controls on the clearing of vegetation in some areas through the City's town planning scheme (City of Busselton Local Planning Scheme No. 21), including in the identified Coastal Management Area, Wetland Area, Landscape Value Area, Floodway Area, or in certain low-density residential zones, but those controls do not apply in most of the urban area.
- At a State level, there are controls on the clearing of vegetation through the Environmental Protection (Clearing of Native Vegetation) Regulations 2004, although there are significant exemptions, which could often apply to clearing of individual trees or small stands of vegetation in most of the urban area.
- At a State level, larger scale clearing and /or larger scale development can be subject of environmental review by the Environmental Protection Authority, and environmental issues can also be considered by the Western Australian Planning Commission and Minister for Planning in considering new town planning schemes, town planning scheme amendments and structure plans.
- At a State level, through the Biodiversity Conservation Act 2016, there are requirements to manage the process of clearing where it may affect Western Ringtail Possum, but the controls do not currently protect habitat per se.
- At a Federal level, clearing or other actions that may affect matters of national environmental significance, including actions that may impact on Western Ringtail Possums or their habitat, can be subject of assessment pursuant to the Environmental Protection and Biodiversity Conservation Act 1999. The current approach to implementation of the Act with regard to Western Ringtail Possum is set out in the Significant impact quidelines for the vulnerable western ringtail possum (Pseudocheirus occidentalis) in the southern Swan Coastal Plain, Western Australia. The Guidelines do provide some protection for habitat in urban areas, but not for the smallest scale clearing, and the resources that have typically been available for enforcement and the consistency of their application has been insufficient to achieve sustained change.

The City has also attempted in the past to provide for better protection of urban habitat through Amendment 146 to the City's previous town planning scheme (Shire of Busselton District Town Planning Scheme No. 20). Amendment 146 was not, however, ultimately supported by the Western Australian Planning Commission and Minister for Planning. In addition, the recently introduced Biodiversity Conservation Act 2016 empowers the State Minister for Environment to make regulations that could provide additional protection for Western Ringtail Possum habitat, including urban habitat. The State's aims and direction in that regard, however, are not currently known.

It is clear that the most significant gap in terms of habitat protection is in relation to small-scale clearing in urban areas, where habitat can be progressively lost through clearing and related development through a 'death by a thousand cuts'. There would, however, appear to be opportunities to address that, either through amendment of the City's town planning scheme, appropriate regulations pursuant to the Biodiversity Conservation Act 2016, a combination of both, or perhaps some other mechanism.

Such mechanisms could increase habitat protection, both in terms of reducing the ability for habitat to be cleared without any approval, and also potentially in terms of what and whether clearing is in fact approved. As the City attempted to do through Amendment 146, incentives to encourage

habitat retention could also be considered - and such incentives could help to ameliorate the financial impact on individual landowners of increased restrictions on clearing.

It is nevertheless not considered reasonable or practicable to simply prohibit all clearing of Western Ringtail Possum habitat - protection of Western Ringtail Possum habitat needs to be considered in the context of other means of preserving the species, as well as needs to accommodate new infrastructure and housing to support a rapidly growing community. At present, where approval is required for clearing of habitat, there is generally a requirement to 'offset' that clearing with habitat enhancement elsewhere – commonly referred to as 'offset planting'.

Whilst clearing should nevertheless be kept to a minimum, current approaches to offset planting are not always satisfactory or optimal and could be improved. The most problematic issues with offset planting are the fact that mature vegetation cannot be effectively replaced by newly planted habitat for several decades, and the requirements for acceptable offset sites are focused on discrete, vegetated areas or reserves, and value is not placed on planting integrated into urban environments where existing habitats are being threatened

Four key opportunities have been identified to get better value out of offset planting-

- Develop a pro-active offset planting programme, which allows for recognition of offset planting undertaken prior to seeking environmental approvals, the pooling of resources, and the meeting of offset planting requirements through a 'cash-in-lieu' system;
- Increased offset ratios, as well as requiring planting of more mature stock (and working proactively with the nursery industry to ensure more mature stock is available);
- Increased recognition of offset planting integrated into urban areas to support important remnant habitat in those areas; and
- Investigation into transplanting of mature WA Peppermint trees (or other trees providing valuable habitat function) to determine if they could form part of future offset planting approaches (noting that this could be trialled using trees which have already been approved to be cleared, and where more conventional offset planting requirements are also already being applied).

Another area that may yield some benefit is looking at the development and application of the City's Bush Fire Notice ('Firebreak and Fuel Reduction Notice') by the City, pursuant to the Bush Fires Act 1954. The City's current notice requires that vegetation not overhang buildings, including houses and sheds, even in urban areas. That requirement has not been rigorously enforced; but was it to be rigorously enforced, it would significantly undermine the value of urban Western Ringtail Possum habitat. It is also not clear that the requirement is necessary from a bush fire hazard mitigation perspective in many parts of our urban areas.

In summary, the following initiatives are considered worthy of exploration in relation to habitat protection (with key levels of government needing to be involved identified in brackets) –

- 11: Introduce additional controls on the clearing of Western Ringtail Possum habitat in urban areas, including small-scale clearing. (Federal, State and Local)
- 12: Consider introduction of incentives to encourage retention of Western Ringtail Possum habitat in urban areas. (Federal, State and Local)
- 13: Develop a pro-active offset planting programme, which allows for recognition of offset planting undertaken prior to seeking environmental approvals, the pooling of

resources, and the meeting of offset planting requirements through a 'cash-in-lieu' system. (Federal, State and Local)

- I4: Consider increased offset planting ratios for clearing of Western Ringtail Possum habitat and planting of more mature stock (and work proactively with the nursery industry to ensure more mature stock is available). (Federal, State and Local)
- I5: Increase recognition of offset planning for clearing of Western Ringtail Possum habitat that is integrated into urban areas, rather than being focused on larger-scale planting in reserves or 'natural areas'. (Federal and State)
- I6: Investigations into transplanting of mature WA Peppermint trees to determine if they could form part of future offset planting approaches. (Local)
- I7: Review Bush Fire Notice ('Firebreak and Fuel Reduction Notice') to consider and reduce the potential impact on Western Ringtail Possum habitat, especially in areas of relatively low bush fire hazard. (Local)

3.2 Habitat enhancement & expansion

Because of climatic (i.e. the drying climate) and land tenure issues (i.e. a lack of suitable government controlled land in coastal or near-coastal locations), it is fairly difficult to enhance or expand Western Ringtail Possum habitat through the creation of new 'natural' habitat. Whether in the form of new 'natural' habitat, or through enhancing urban habitat, the long lead-time required to grow new mature WA Peppermint trees (20 years plus), also means that habitat enhancement and expansion cannot occur quickly, even where space can be found to do so.

The long lead-time required to create enhanced or expanded habitat means that it makes sense to undertake the process of doing so as quickly as possible. In simple terms, it makes sense to undertake as much planting as possible as soon as possible, so that it develops into useful habitat as soon as possible. The City does have street and park reserve planting programmes which are seeing a progressive increase in potential Western Ringtail Possum habitat, but those programmes could be substantially accelerated, including in the following ways —

- Increasing the annual budget allocation for street and reserve tree planting, potentially bringing forward to the next few years expenditure that might otherwise occur over the next couple of decades;
- Increasing the efficiency of the street tree planting programme, by planting trees on verges at higher densities (including verges where tree planting has already occurred, but at relatively low densities), and going ahead with planting of WA Peppermints unless the adjoining owner has objected (during the consultation period), rather than the current situation, where a tree is only planted where the adjoining owner has indicated their support, and has indicated their preference of tree species;
- Increasing the planting of WA Peppermint trees and understorey species in reserves
 that are in areas where there is good urban Western Ringtail Possum habitat, including
 foreshore reserves that may be suitable, and grassed areas of reserves where the
 grassed areas are not required for recreation purposes;
- Identifying reserves with higher quality Western Ringtail Possum habitat in rural areas, surveying for presence of Western Ringtail Possum, managing them as Western Ringtail Possum habitat and undertaking actions to link these areas. The Wadandi Track is a significant reserve that passes through a range of vegetation types and reserves that are relatively intact. There are, however, large areas reserves that are cleared and will

require a large effort to undertake meaningful revegetation to form Western Ringtail Possum habitat, and

As has already been recommended as an initiative under 'Habitat Protection', planting of more mature stock (and working proactively with the nursery industry to ensure more mature stock is available).

Most of these potential changes to street and park tree planting programmes would also improve the aesthetics and amenity of urban areas, and ameliorate 'urban heat island' effects that will become more acute with climate change and increased density of development.

There are some further actions that are considered could assist in habitat enhancement and expansion, including -

- Further research into why some WA Peppermints grow leaves palatable to Western Ringtail Possum and others do not and, if possible, planting programmes that result in palatable trees;
- Unless there is a clear reason not to do so (such as because of perceived security/visibility or fire risk), the dense planting of understorey shrubs and sedges, to provide protective cover for Western Ringtail Possum should they come to ground, around WA Peppermint trees on reserves, and changes to management practices in relation to existing trees in reserves;
- Increased investment in 'possum crossings' to assist Western Ringtail Possum in crossing roads; and
- Encouragement and incentives for the enhancement and expansion of Western Ringtail Possum habitat on private land.

Habitat enhancement also includes the removing of barriers and impediments to Western Ringtail Possum movement. Western Ringtail Possum are less prone to predation by other animals and road kill if they can move from one tree to another without having to come to ground. Connections between habitat trees can be made with large diameter ropes, or through slightly higher boundary fences. In many older parts of the district the Western Power grid can either be fatal to possums (if wires exposed) or provide a connection between habitat trees (if insulated). The following actions could enhance Western Ringtail Possum habitat by removing impediments to movement above the ground.

- Controls/guidelines on boundary fencing to encourage fencing that Western Ringtail Possum can use to travel through the urban environment – this would generally mean fencing 2.1 metres (rather than 1.8 metres) high, or fixing of timber capping to the top of fencing to provide better grip for possum passage; to reduce the risk from dogs, and no 'possum guards' or similar on fences.
- Increase connectivity between trees with large diameter rope within City reserves;
- Work with Western Power to reduce the possibility of electrocution and facilitate Western Ringtail Possum moving between habitat trees by increasing the height of the low voltage uninsulated wires of the above ground network and increasing the clearance for habitat trees to grow underneath.

The City has also identified an area where the State may wish to focus attention in terms of strategic land acquisition, that being the land between Abbey/Vasse and Dunsborough, and between Caves Road and the future Vasse-Dunsborough Link alignment. This area is in a near-coastal location, will require land acquisition and property severance to allow for the development of the Vasse-

Dunsborough Link, has good potential access to water, being at the terminus of a number of small rivers/creeks and rural drain networks, and could be developed into a corridor linking the Busselton and Dunsborough urban areas, allowing Western Ringtail Possum gene flow between habitat areas in the Geographe Bay coastal hinterland. Predator control would need to be part of such a program as predation by foxes is a significant factor in possum mortality in rural areas.

In summary, the following initiatives are considered worthy of exploration in relation to habitat enhancement and expansion (with key levels of government needing to be involved identified in brackets) –

- I8: Increasing the annual budget allocation for street and reserve tree planting, bringing
 forward to the next few years expenditure that might otherwise occur over the next
 couple of decades. (Local)
- I9: Increasing the efficiency of the street tree planting programme, by planting trees on verges at higher densities (including verges where tree planting has already occurred, but at relatively low densities), and going ahead with planting of WA Peppermints unless the adjoining owner has objected (during the consultation period), rather than the current situation, where a tree is only planted where the adjoining owner has indicated their support, and has indicated their preference of tree and understorey species. (Local)
- I10: Increasing the planting of WA Peppermint trees in reserves that are in areas where
 there is good urban Western Ringtail Possum habitat, including foreshore reserves that
 may be suitable, and grassed areas of reserves where the grass is not required for
 recreation purposes. (Local)
- I11: Identifying reserves with higher quality Western Ringtail Possum habitat in rural areas, undertaking actions to improve their habitat value and link them e.g. The Wadandi Track is a very significant reserve (100m wide) that passes through a range of vegetation types and reserves that are relatively intact. This could provide a strategic habitat corridor through the landscape.
- I12: Planting of more mature stock (and work proactively with the nursery industry to ensure more mature stock is available). Note: this is in part duplication of I4. (Local)
- I13: Further research into why some WA Peppermints grow leaves palatable to Western Ringtail Possum and others do not and, if possible, planting programmes that result in palatable trees. (State)
- I14: Unless there is a clear reason not to do so (such as because of perceived security/visibility or fire risk), the dense planting of understorey shrubs and sedges, to provide protective cover for Western Ringtail Possum should they come to ground, around WA Peppermint trees on reserves, and changes to management practices in relation to existing trees in reserves. (Local)
- I15: Increased investment in 'possum crossings' to assist Western Ringtail Possum in crossing roads. (Federal, State and Local)
- I16: Encouragement and incentives for the enhancement and expansion of Western Ringtail Possum habitat on private land. (Federal, State and Local)
- I17: Controls/guidelines on boundary fencing to encourage fencing that Western Ringtail Possum can use to travel through the urban environment this would generally mean fencing 2.1 metres (rather than 1.8 metres) high, to reduce the risk from dogs, and no 'possum guards' or similar on fences. (Local)

- I18: Work with Western Power to reduce the possibility of electrocution and facilitate Western Ringtail Possum moving between habitat trees by increasing the height of the low voltage uninsulated wires of the above ground network and increasing the clearance for habitat trees to grow within. (State and Local)
- I19: Land acquisition The City has also identified an area where the State may wish to focus attention in terms of strategic land acquisition, that being the land between Abbey/Vasse and Dunsborough, and between Caves Road and the future Vasse-Dunsborough Link alignment. This area is in a near-coastal location, will require land acquisition and property severance to allow for the development of the Vasse-Dunsborough Link, has good potential access to water, being at the terminus of a number of small rivers/creeks and rural drain networks, and be developed into a corridor allowing for Western Ringtail Possum gene flow between the Busselton, Vasse and Dunsborough urban areas. There may be other strategic land acquisitions in rural and regional areas at some time in the future and the City would support these also being considered for the creation of Western Ringtail Possum habitat.

3.3 Community engagement & education

The following community engagement activities are currently occurring and should be continued. The City may consider how it can increase its support to and involvement in these activities as a means of improving community engagement and education.

- Possum night stalks are a fun and informative activity that are attractive to young families to learn more about Western Ringtail Possums and then go searching for them in one of our local parks.
- Promotion of the annual street tree planting program and provision of free street trees
 to residents is a means of getting more habitat trees planted and is a tangible item that
 residents can receive for their rates by participating in the schemes.
- Installation of possum awareness road signage has been designed to remind drivers of possum hotspots and what the animal looks like when crossing the road.
- Investigation of other traffic calming devices/techniques that will improve driver behaviour in dense Western Ringtail Possum population areas
- Installation of possum interpretive signage in high public use areas.
- Seasonal messages about possums in local and social media.
- Citizen science programs such as 'The Ringtail Tally', a monitoring exercise coordinated through Geocatch

3.3.1 Possum friendly neighbourhoods

There are a number of existing information sources and programs, such as NatureVerge, that could be drawn together into a package that promotes Possum Friendly neighbourhoods. This package could be a means of enabling people to implement the many initiatives listed in this report by promoting practical on-ground actions such as: planting of habitat vegetation, improving fences, creation of enclosures for domestic dogs and cats, preventing Western Ringtail Possum accessing roof spaces, improving the habitat value and condition of existing vegetation.

3.3.2 TV, radio and social media advertising

Community surveys have shown that the majority of the community are either indifferent or like Western Ringtail Possums. However, a small percentage of people believe that they are a pest

and/or do not believe they are Critically Endangered. There are a range of reasons why people believe these things, however, it is evident that there needs to be a continued effort to change attitudes and behaviours towards Western Ringtail Possum. Many of the events put on to encourage community understanding of the animal are mostly attended by 'the converted'. In order to reach the less engaged, and at least encourage more informed discussion with peers about the plight of the Western Ringtail Possum, a TV, radio and social media campaign could be used to deliver the message. South West Catchments Council has run a successful campaign called 'Save the Crabs' which was believed to be successful in changing behaviour about the timing and use of fertilisers around the Peel/Harvey Estuary. TV advertising could contribute to spreading of the message about Western Ringtail Possum in a number of ways, including;

- Implementing coordinated awareness and education programs with government agencies and community organisations.
- Targeting a Western Ringtail Possum awareness campaign for the southwest region.
- Running a tourism campaign through the MRBTA to promote the uniqueness of the Western Ringtail Possum within the region.

3.3.3 **Summary**

In summary, the following initiatives are considered worthy of exploration in relation to Community engagement and education (with key levels of government needing to be involved identified in brackets);

- I20: Continued involvement in and support for existing community engagement activities such as Possum night stalks, Geocatch Western Ringtail Possum tally, Nature Conservation Margaret River Citizen Science Western Ringtail Possum survey, promotion of the street tree planting program and free street trees to residents, installation of possum awareness road signage and possum interpretive signage in high public use areas, seasonal messages and interest articles about possums in the local newspaper and internet sites and citizen science programs. (State and Local)
- I21: Development and roll out of a Possum Friendly Neighbourhoods package that draws together existing information sources and programs and promotes practical on-ground actions that residents can take to improve Western Ringtail Possum survival. (State and Local)
- 122: TV, radio and social media helps to increase understanding and acceptance of Western Ringtail Possum in the wider community. These campaigns may be of a general information nature or serve to promote tourism or community involvement in the community awareness activities above. (State)

3.4 Dog, cat & feral animal management

Decline in Western Ringtail Possum numbers in rural areas has largely been attributed to clearing and fox predation. Foxes are an effective predator and have been known to jump up, or climb trees, to catch Western Ringtail Possum. Conditions over the past 12 months have been favourable for foxes, such that numbers have increased, and have pushed into urban areas searching for food. The City has had a marked increase in the number of reports by residents of foxes taking their chickens and there have been many more observations of predation on possums in urban parklands and natural areas. Options for fox control in urban areas are limited. The City loans cage traps as an option for residents who want to catch a fox, however, the success rate is fairly low. The most effective means is using 1080 poison but this can only be done in rural areas, and under permit. The

City may have best effect in controlling foxes by encouraging landowners in peri-urban and rural areas to undertake fox baiting programs.

Western Ringtail Possum that encounter domestic cats and dogs are often killed or severely injured. Under the existing dog and cat laws owners are required to keep their pets contained within their properties, or under their control. In public areas dogs must be restrained on a leash, except within dog exercise areas. Currently there is little the City can do to discourage dog and cat owners from allowing their dog or cat to wander. The onus for proving a cat or dog is substantially on those that are affected by the nuisance animals. Affected people often loan a cat trap, catch the offending animal on their own property and hand it to City of Busselton Rangers. Rangers then identify the animal, contact the owners and return the animal. At this point the owner is advised of their responsibilities.

The City can make its own local laws but is constrained by the State Dog and Cat Acts. However, local government can make local laws about (Cat Act 2011, Division 2 Local laws, Section 79, Clause (3) -

- (e) cats creating a nuisance;
- (f) specifying places where cats are prohibited absolutely; and
- (g) requiring that in specified areas a portion of the premises on which a cat is kept must be enclosed in a manner capable of confining cats.

The costs and complexities of such regulations could, however, require very careful consideration.

The City can also undertake its own trapping program in public areas to try to catch reported nuisance animals.

In summary, the following initiatives are considered worthy of exploration in relation to Dog, Cat and feral animal management (with key levels of government needing to be involved identified in brackets) -

- 123: Investigate and develop a control program that encourages the control of foxes and feral cats on larger private holdings in peri-urban areas. (Local)
- 124: Expand the fox and feral cat control programs on City reserve lands and actively promote control activities to adjoining land owners. (Local)
- 125: Consider modification of Local Laws in relation to the keeping of cats that place more responsibility on the pet owner to contain their pets on their property. (Local)
- 126:Implement targeted cat ownership awareness programme to reduce cat and Western Ringtail Possum fatal interactions. (Local)

3.5 Rehabilitation & new populations

A protocol for the rehabilitation of possums (and all native fauna) found injured has been developed by the Western Ringtail Action Group, comprising local groups, DBCA and local vets. The protocol ensures injured animals can be diagnosed and put into appropriate care as quickly as possible. Local vets currently examine native animals and prescribe care requirements free of charge. Where an animal cannot be rehabilitated to a level where it can return to the wild it is euthanized, and where it can be rehabilitated they are then given to carers. Rehabilitation of injured animals can sometimes be a 24/7 activity and there are costs for consumables and equipment such as food and heat pads. It is important to recognise the voluntary effort in some way. The needs of carers are varied and many, and as such, dialogue with the groups concerned is required to determine appropriate and useful forms of support. The following actions could help to support the work of carers, working to improve care of injured possums and success rates for possums released back into the wild.

- Liaise with agencies and care groups to determine appropriate and useful forms of support.
- Support carer training programs.
- Promote and where appropriate, facilitate collaboration between agencies and community based organisations on possum related activities such as injury care and rehabilitation.

It is not considered, however, that local government should not play a significant role with the wildlife care matters. The effectiveness of animal care in ensuring the survival of the species is also unclear.

There may also be opportunity to establish or enhance new urban habitat elsewhere in the south west

In summary, the following initiatives are considered worthy of exploration in relation to Care, captive breeding & new populations (with key levels of government needing to be involved identified in brackets);

127: Liaise with agencies and care groups to determine appropriate and useful forms of support. (State)

3.6 Research & monitoring

While the City is not usually responsible for undertaking research it can, for example, facilitate the use of certain spaces for the carrying out of research and actively pursue implementation of the outcomes of research. One such example of implementation of research would be to understand the issue of palatability of vegetation. The effectiveness of revegetation effort may be improved significantly if a greater proportion of the vegetation being planted is palatable to possums.

There is a growing interest in citizen science surveys, such as the Western Ringtail Possum Tally. Possums are easy to spot and very accessible. Most people in Busselton and Dunsborough can participate from home. The more people involved, the better the results from the survey. Another outcome from such programs is greater community awareness and appreciation for the animal, which is a key objective of this plan. A baseline survey and long term monitoring program of the Western Ringtail Possum population would help to determine the success or otherwise of the plan.

In summary, the following initiatives are considered worthy of exploration in relation to Research & Monitoring (with key levels of government needing to be involved identified in brackets);

- I28: Review research undertaken on palatability and support propagation of palatable species for use in vegetation programmes. (State and Local)
- 129: Support and promote citizen science possum monitoring within the community (State and Local)
- I30: Undertake a base survey of possum populations and develop a monitoring programme for the periodic long term measurement of possum populations to gauge overall success of possum recovery and enhancement. (State and Local)

3.7 Governance, funding & partnerships

The Federal Department of Environment and Energy is responsible for administration of the EPBC Act. However, there are very few resources based in WA and an inadequate number of compliance officers to assess applications and investigate reports. The change in status of the Western Ringtail Possum to 'Critically Endangered' and the consequent changes to the significant impact criteria mean there is an increased effort required to ensure developments do not impact on the species. If there are to be changes to the level of enforcement all levels of government need to be giving a consistent message, supporting one another and enforcing the newer more stringent criteria to protect the species.

Western Ringtail Possum are a Federally listed species and under the current funding arrangements through the Federal Government, funding is available for projects concerning Western Ringtail Possum. However, the funding pool is vastly inadequate for the number and value of projects put up under the National Landcare Program each year. With the assistance of the South West Catchments Council a very comprehensive application was prepared in 2017. All organisations working on Western Ringtail Possum in the Capes-Geographe region were involved. The combined value of the project was \$250,000. The project was competing with other projects on native species with higher status and although it was a competitive project could not be funded. Funding from the Federal and State Government would be vital to the success of this Western Ringtail Possum plan. A wide range of activities are proposed because this issue needs to be tackled on many fronts. Everyone has a role to play in the management of Western Ringtail Possum and therefore funding of multi-faceted, multi partnered projects is important. The City has a role to play in getting this message across to our federal and state politicians to ensure projects around Western Ringtail Possum are funded in future.

There are many organisations and agencies that have influence on Western Ringtail Possum directly or indirectly, or that could have, the following are just a few. Agencies include: Western Power, Water Corporation, DBCA, Tourism, Telecommunications companies, Main Roads, Planning Department and planning authorities. Business, community groups and other organisations include; Geocatch, Nature Conservation Margaret River, South West Catchments Council, Western Ringtail Possum groups, vetinarians, tour operators, landscapers, nurseries, World Wide Fund for Nature, Australian Conservation Foundation, research institutions and Universities.

These areas of work could be very significant in terms of supporting on-ground action, community behaviour change programs, enforcement and providing incentives that are consistent with this plan.

In summary, the following initiatives are considered worthy of exploration in relation to Governance, Funding & Partnerships (with key levels of government needing to be involved identified in brackets)

- I31: Collaborate with other stake holders on a wide range of activities to develop robust, multi-faceted projects that are competitive for the larger funding opportunities.
- I32: Seek federal and state political support for the implementation of this Western Ringtail Possum plan and the Western Ringtail Possum Recovery Plan to ensure Western Ringtail Possum projects are funded.
- 133: Build relationships with key stakeholders in the tourism industry for the purpose of conservation, awareness and visitations.

Scheme No. 20

AMENDMENT 146 - INTRODUCTION OF 'WESTERN RINGTAIL POSSUM HABITAT 11.4 PROTECTION' AREA - ADOPTION FOR FINAL APPROVAL

SUBJECT INDEX: **Town Planning Scheme Amendments**

APPLICATION NUMBER: WAPC09/0013

STRATEGIC PRIORITY: 8: Provide appropriate planning and regulatory

measures to ensure orderly and acceptable

development of the district.

BUSINESS UNIT: Planning and Development Services

SERVICE: Strategic Planning

REPORTING OFFICER: Strategic Planning Officer - William Hosken

AUTHORISING OFFICER: Director Planning and Development Services - Paul

Needham

DATE OF COMPLETION: 12 January 2012 **VOTING REQUIREMENT:** Simple majority

Introduce a new special control area over established PROPOSAL:

> areas of the Busselton and Dunsborough and associated clearing requirements and development incentives for the purpose of addressing the progressive loss of Western Ringtail Possum habitat. Various lots comprising the established areas of the

AREA: Busselton and Dunsborough town sites. Comprises a

variety of zonings, predominantly including

'Residential' zoned lots.

POLICIES: 1. Commonwealth Significant impact guidelines for

the vulnerable western ringtail possum

(Pseudocheirus occidentalis) in the southern Swan

Coastal Plain, Western Australia 2. WAPC South-West Framework

3. WAPC State Planning Policy 2: Environment and

Natural Resources Policy

4. WAPC State Planning Policy 3: Urban Growth and

Settlement

ATTACHMENT(S): Attachment A: Scheme Amendment Map

Attachment B: Schedule of Submissions

Attachment C: Consolidated Report, Minutes and

Attachments from consideration of related item at 25 May 2011

OCM

Attachment D: Scheme Provisions (Track Changes

Version)

Attachment E: Example Cases

DISCLOSURE OF INTEREST					
Name / Position	Councillor Grant Henley				
Item No. / Subject	11.4 - INTRODUCTION OF 'WESTERN RINGTAIL POSSUM HABITAT PROTECTION' AREA — ADOPTION FOR FINAL APPROVAL				
Type of Interest	Financial Interest				
Declaration	I own a property, the value of which could be affected by this amendment				

DISCLOSURE OF INTEREST				
Name / Position	Councillor Tom Tuffin			
Item No. / Subject	11.4 - INTRODUCTION OF 'WESTERN RINGTAIL POSSUM HABITAT PROTECTION' AREA — ADOPTION FOR FINAL APPROVAL			
Type of Interest	Financial Interest			
Declaration	I own a property in the City of Busselton which is densely populated with peppermint trees			

PRÉCIS

The Council is requested to consider adopting for final approval Scheme Amendment 146 (amendment) for the introduction of a 'Western Ringtail Possum Habitat Protection' area and associated clearing requirements and development incentive provisions. The proposed area includes the established areas of the Busselton and Dunsborough town sites, both of which contain significant amounts of important habitat. Final adoption of the amendment, with modifications, is recommended.

This proposal was considered at the Council meeting of 12 September 2012 where the Council resolved to defer consideration of the item. Following this, two Council briefings were held to explore the issues in further detail. This proposal is again formally presented, with some additional changes to address concerns/ issues raised by Councillors, and with an additional attachment (E) to provide example cases to demonstrate the implementation of the proposed provisions.

PROPOSAL / BACKGROUND

At its meeting of 25 May 2011, the Council resolved to initiate town planning scheme amendment 146 to introduce a 'Western Ringtail Possum Habitat Protection Area' and associated provisions. The amendment seeks to regulate the clearing of WA Peppermint tree based habitat above a specific trigger level in the older urban areas of Busselton and Dunsborough, providing for 'offset planting' on approval of the clearing, but also providing for a range of incentives to encourage the retention and enhancement of existing habitat.

The Council resolution (C1105/170) set out a number of initiatives to achieve protection of Western Ringtail Possum (WRP) habitat, including the proposed 'Western Ringtail Possum Habitat Protection Strategy'. Amendment 146 is presented for final approval so it can be finalised within the timeframes associated with Gazettal of Local Planning Scheme No. 21. Some final work however, is needed before the overall strategy itself can be presented to Council for finalisation. It is expected that will occur over the next several months.

The amendment proposal, its background and rationale, is set out in some detail at Attachment C, which is the consolidated report, minutes and attachments from when this matter was considered last May. The scheme amendment map is at Attachment A.

The scheme amendment was forwarded to the Environmental Protection Authority (EPA) pursuant to Part 5 of the *Planning and Development Act 2005* and the EPA

advised that it should not be assessed under Part IV of the *Environmental Protection Act* 1986. The amendment was subsequently advertised for 42 days (advertising closed 23 May 2012).

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STATEMENT OF IMPACT

The amendment will have direct impacts on landowners who seek to clear habitat areas that trigger the need for approval under the provisions. The trigger for requiring approval is set such that only those undertaking significant development will be affected. The inclusion of incentive provisions provides benefit to landowners to achieve a 'win-win' outcome for the environment and landowners. The amendment will also help to clarify the provisions relating to habitat protection and reduces uncertainty, which has been a concern to a number of developers in recent times.

The recommended changes to the amendment following advertising are generally consistent with the Council's direction and purpose for initiating the amendment and are therefore considered to be of a minor nature in terms of landowner impact.

CONSULTATION

As a result of advertising, eleven submissions were received. A Schedule of Submissions is included as Attachment B.

Two submissions were received from government agencies (State Department of Environment + Conservation [DEC], and Federal Department of Sustainability, Environment, Water, Population + Communities [SEWPaC]) and which indicated support for and advice relating to the proposed amendment.

Five submissions were received from community groups representing their membership bases consisting of individual community members, which all generally supported the proposed amendment, but identified various issues with the proposed provisions and their interpretation in practice.

Four submissions were received from members of the public and/or landowners. One submission was in support of the proposal, one requested modifications to remove an identified land holding, and two objected to the proposal.

Further discussion of the main issues identified in these submissions is provided in the 'Officer Comment' section of this report.

STATUTORY ENVIRONMENT

The key, relevant statutory instruments with respect to the proposed amendment are set out in the City of Busselton District Town Planning Scheme No.20 and the Planning and Development Act 2005 as well as various environmental legislation including:

- Commonwealth Environmental Protection and Biodiversity Conservation Act 1999 ('EPBC Act'):
- * State Environmental Protection Act 1986 ('EP Act');
- State Environmental Protection (Clearing of Native Vegetation) Regulations 2004 ('Clearing Regulations');
- * State Wildlife Conservation Act 1950 ('Wildlife Act').

The proposal was previously assessed as meeting the requirements of the relevant legislation (refer Attachment C).

POLICY IMPLICATIONS

The key policy implications for consideration are set out in the following:

- * WAPC South-West Framework;
- WAPC State Planning Policy 2: Environment and Natural Resources Policy ('SPP2');
 and
- * WAPC State Planning Policy 3: Urban Growth and Settlement ('SPP3').

The proposal was previously assessed against the relevant policy provisions and found to be consistent with relevant policy guidance (refer Attachment C).

FINANCIAL IMPLICATIONS

Financial implications associated with the recommendations of this report relate to implementation of additional clearing controls, which could potentially increase the City's planning assessment workload. It is somewhat difficult to estimate how much that increase would be. It is also envisaged that the coupling of the clearing requirements with incentives would tend to mitigate any increase. Officers are of the view that implementation of the proposed provisions would not require additional resources, and the additional workload involved would not be significant.

STRATEGIC IMPLICATIONS

The recommendations of this report reflect Strategic Priority 8 of the City's 2010-20 Strategic Plan, which is to - 'Provide appropriate planning and regulatory measures to ensure orderly and acceptable development of the district'. The recommendations of the report are also consistent with Strategic Priority 6, which is to – 'Manage and Enhance our Heritage and Natural Environment'. Pursuant to this priority there is a proposed project of 'Western Ringtail Possum habitat protection planning'. This strategy reflects the outcome of past community surveys (2005-2007) that have identified protection of the environment as one of the concerns of the community. That has also been reflected in more recent community surveys.

OFFICER COMMENT

The proposed amendment was advertised for a period of 42 days closing 23 May 2012, during which time a community consultation session was held (and a second session was cancelled due to lack of registered interest). A total of eleven submissions were received (including late submissions).

The majority of submissions were generally supportive of the Amendment and the City's initiatives to achieve protection of Western Ringtail Possum habitat more broadly.

A number of key issues were identified in submissions with relevance to the amendment, broadly defined under the following headings:

* Amendment wording, definitions and interpretation

- Proposed clearing requirements
- * Proposed incentives provisions

Responses to identified issues are provided in the Schedule of Submissions (Attachment B), including general responses where submissions relate principally to the overall strategy, rather than this amendment specifically (note that a further report on the strategy will follow over the next several months).

Key Issues

The following paragraphs outline and discuss the key issues set out in the submissions and which should be considered in finalising the amendment.

* Objections to the provisions:

Two submissions were received in objection to restrictions on clearing and the requirement for clearing to gain approval. As outlined in the provisions, clearing in association with permitted development will not be refused by the City, and is therefore representative of a development requirement rather than a clearing control.

Under the proposed provisions an approval will only be required in identified circumstances, with vegetation that is not classified as 'core habitat', areas of core habitat under 100m² and clearing necessary for safety purposes not requiring approval. Although there are significant exemptions, it is acknowledged that the proposed provisions will increase the instances where an approval is required for clearing. It is expected that a significant proportion of these instances will occur where a development approval is otherwise required. Building extensions, outbuildings and similar developments are unlikely to be affected by the provisions.

The provisions also provide greater equity and will discourage unnecessary or premature clearing. Currently, clearing that does not trigger State/Commonwealth approval does not require approval at all. But if vegetation is present when a development application is received, the impact of clearing can and must be considered by the City, which creates an incentive to clear vegetation before submitting a development application. The provisions therefore remove the current inequitable situation and perverse incentive.

* Introduction of clearing requirements risking proliferation of tree removal:

Several submissions also noted that the clearing requirements might risk the proliferation of clearing in advance of their introduction. This is considered to be a relatively small, but .real risk, best managed by quickly progressing to Gazzettal of the amendment.

This risk should also be minimised by promoting the proposed incentive provisions, such that landowners considering removing vegetation prior to Gazettal of the amendment may be prompted to reconsider. Timely

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progression of the amendment will also minimise the vegetation removed prior to the introduction of clearing approval requirements.

* Identification of 100m² habitat trigger:

The area of habitat which triggers the proposed clearing requirements has been proposed as 100m^2 of canopy area, which will exclude the clearing and partial removal of most single trees and immature trees. Coupled with exemptions for safety requirements, this ensures that the ability of existing landowners/ residents to undertake residential scale developments (such as extensions and outbuildings) is not commonly affected by the clearing requirements.

Where a more significant area of habitat is being removed, such as may take place for grouped dwellings or subdivision, the clearing requirements will play a greater role (in conjunction with the incentive provisions).

Several submissions have suggested that this trigger of 100m² is too high and that the trigger should be set lower, for instance at 50m². However, a lesser figure will increase the number of cases to which the clearing requirements apply, and the potential for confusion as to whether an approval is required will increase. Officers recommend retaining 100m² as the minimum amount of clearing for which an approval is required.

* Application and assessment of the clearing requirements and exemptions:

Several submissions note that the exemptions allowing clearing for safety purposes may be exploited to avoid the requirement for an approval. Officers acknowledge this as an issue, but these exemptions are considered necessary and appropriate. This approach is also consistent with other clearing controls in place in low density residential and special character

Further details regarding the assessment of habitat values and other native vegetation are contained in the overall strategy. The assessment of applications will account for such matters as: appropriate separation distances between development and habitat areas (including offsets); tree canopies across lot boundaries and the viability of retained habitat (including conditions for replacement); which are best addressed on a site by site basis.

Appropriate guidelines will be put in place to ensure consistency of assessment and decision making. If required, a Local Planning Policy may be prepared to address the practical application of these provisions and address any identified policy gaps, as noted in the previous report to Council regarding this amendment.

As concerns regarding the application of the proposed clearing approval requirements can be addressed through finalisation of the overall strategy, or more detailed guidelines, officers recommend no modification to the amendment in these respects.

Attachment B Final Council report for Amendment 146 to Town Planning

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Application and assessment of the proposed incentive provisions:

While the proposed incentive provisions received general support, submissions identified several questions about how they might work in practice.

As identified in one submission, the incentives afford a density bonus in a similar manner to Clause 58, however they may only be utilised within the WRP Habitat Protection Area where the same provisions apply. The incentives may be utilised in addition to the R-Codes variations afforded by Clause 58, however each of these is at the discretion of the Council to determine whether use of any development bonuses is consistent with the amenity of the locality. Should further guidance to address these matters and the potential for transfer to high value or low density sites be necessary, a Local Planning Policy will be prepared.

Assessment of proposals will include consultation with adjoining landowners and will consider the value and viability of habitat to be retained and protected, in accordance with the guidance provided in the overall strategy. Standard approval conditions relating to the protection of habitat, via covenant, and the maintenance and replacement of vegetation will be developed as required.

Modifications

As a result of consideration of issues in submissions and subsequent Council briefings, some modifications to the amendment provisions are proposed. However, the majority of concerns raised in submissions relate to the practical application of the provisions, which will be addressed through finalisation of the overall strategy and the subsequent planning assessment processes. Due to the relatively nature of modifications proposed, being minor or otherwise reflective of submissions, further public consultation is not considered necessary.

The most significant modifications proposed are as follows:

Exclusion of Residential Zones areas with a density of less than R10 from the habitat protection area:

Low density residential areas (R2, R2.5, R5) are proposed to be excluded from the provisions to reflect that existing scheme controls regulate clearing in these areas and that the application of development incentives in these areas may compromise neighbourhood amenity and other planning objectives which relate to the low density of these areas. This relates lots in the Quindalup, Siesta Park and Marybrook localities between the Busselton and Dunsborough town sites.

Exclusion of areas within the Business and Restricted Business Zones from the habitat protection area:

The commercial areas of Busselton and Dunsborough do not generally contain a significant amount of habitat on private land, and in many cases the on-site retention of vegetation can compromise development outcomes 38

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in areas where functional urban design is a high priority. Development incentives are proposed in Scheme Amendment 181 (West Street) for the Busselton City Centre, and currently being formulated for Dunsborough Town Centre. It is seen as preferable, therefore, that these areas are excluded from the areas affected by this amendment.

* Addition of a clause to ensure that Clause 58 density provisions do not apply in addition to the development incentive provisions proposed (and vice versa):

Notwithstanding the individual merit of each, the application of Clause 58 density provisions as well as the proposed development incentives may result in a significant increase in the density of development that is not compatible with maintaining the amenity and character of a residential area. To avoid confusion, a specific clause preventing Clause 58 and habitat incentives being applied to the same site, is recommended.

* Removal of the proposed incentive which allows for the transfer of density between sites within the habitat protection area:

This clause has been the subject of some confusion and officers suggest, given that it is not likely to be applied in a significant number of cases, that this clause is removed from the amendment in order to simplify the provisions.

Should the Council wish to retain this clause, officers recommend that local planning policy provisions are prepared in order to provide guidance for the implementation of this incentive. Although officers recommend removing this clause, an incentive of this type could be reconsidered in the future if an appetite is demonstrated by the development industry and in the context of changes to density which may be proposed by the forthcoming Local Planning Strategy.

Minor modifications to the amendment text are also proposed, including:

* Drafting changes to simplify the amendment wording and correct clause references:

Submissions and general feedback received during the consultation process indicated that the provisions were difficult to understand. As such, some minor modifications to the wording of the provisions are proposed to provide clarification and correct minor errors. These modifications are very minor and do not have any appreciable impact on the provisions as proposed.

* Drafting changes to clarify application of incentives:

One submission identifies that the incentive provisions appear to apply to areas of habitat under 100m² (sub-clause 8 refer to 'In all other cases...'), in contrast to the clearing approval requirements which only apply over 100m². The incentives are not intended to apply to habitat areas under

100m², as this would potentially qualify lots with small, insignificant habitat areas for a development bonus. Officers are proposing modifications to clarify that this is not the case.

* Calculation of density bonuses:

Additional information is proposed to be added to the provisions to clarify how density bonuses granted by the City are calculated. This ensures a consistent methodology is applied to proposals.

The approach employed applies the percentage density increase to the number of dwellings otherwise allowable under the prevailing density coding. For example, a typical $1012m^2$ lot with a density coding of R30 allows for 3.37(3) dwellings, which becomes 4.21(4) dwellings with a 25% or 5.06 (5) dwellings with a 50% density bonus applied. This represents a simple way of calculating development density and is also consistent, in outcome rather than method, with the R-Codes site area concessions for aged persons housing.

* Modify exemptions to refer to 'immediate' threat

Several submissions raised concerns regarding the potential for clearing exemptions for safety purposes to be exploited to avoid approval and offset requirements. This included noting that the interpretation of a 'potential' threat to life or property is open to interpretation, and that all trees pose some level of threat in an urban environment.

Officers recommend modifying proposed sub-clause (4) to refer to an 'immediate' threat to life or property. This provides greater consistency with other clearing controls in the Scheme and reduces the likelihood of disputes relating to this exemption.

* Removal/extension of the proposed sunset clause:

Several submissions objected to the inclusion of the sunset clause, which was considered to be contrary to the intent of the amendment. A sunset clause was included in the proposed amendment to prompt review of or to otherwise allow for the provisions to fall away at such time as most habitat within the Area has been either protected or removed and offset.

As it is difficult to determine the rate at which infill development opportunities will be taken up, and therefore the rate at which habitat retention will be addressed, it is very difficult to determine an appropriate date for the sunset clause. This could certainly, though, be longer than that which is currently proposed, the effective period of which has reduced significantly since late 2009 when the provisions were first drafted. It is now likely to be late 2012/early 2013 before the provisions come into effect.

It could also, however, be argued that at such a time the provisions will have only limited practical application, and that having no sunset clause will allow for a 'natural death' of the provisions. Should the proposed provisions

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become no longer necessary at a future point in time due to the transition of habitat to protected areas (reserves and covenants), they will simply cease to be applied and can be reconsidered as part of the next appropriate scheme review.

The sunset clause may also reduce the attractiveness of the incentive provisions, which require habitat to be retained beyond the period when the clearing approval requirements apply.

Officers are recommending removal of the sunset clause, although the Council may also consider the option of retaining the sunset clause and extending the date to some 15 to 20 years from Gazettal to allow sufficient time for the provisions to provide for infill development and for offset planting to reach maturity and adequately replace habitat removed from private land.

A version of the amendment text illustrating the specific changes proposed is included as Attachment D.

Following Council briefing on the matter, Attachment E has been included in this report to provide examples of how the proposed provisions might be implemented, noting that this relies on offset ratios and other details which are provided in the related draft 'Western Ringtail Possum Habitat Protection and Enhancement Strategy'. This Strategy will be presented to the Council for consideration of final adoption once Amendment 146 has been finalised, so as to accurately reflect the provisions in their final form. As such, offset ratios and other details related to the implementation of the provisions do not need to be considered at this time.

CONCLUSION

The proposed amendment provides for the introduction of clearing requirements and development incentives as part of a coordinated approach to the protection and enhancement of important areas of Western Ringtail Possum habitat. This has been designed to achieve long term benefits whilst minimising the costs to landowners and not compromising the desirable urban consolidation of Busselton and Dunsborough.

In light of the public consultation process, minor modifications to the drafting of the amendment and a modification to the clearing exemptions are proposed, with other concerns raised able to be addressed through the finalisation of the Strategy and, subsequently, the planning assessment process.

It is requested that Council resolve to adopt the town planning scheme amendment, inclusive of the modifications as recommended.

Options

In relation to outcomes, the Council has the option to endorse parts of the officer recommendation and not others to address specific areas of concern.

In relation to process, the Council could defer consideration of the matter until details relating to the application of the proposed provisions are prepared, either through

finalisation of the Strategy or preparation of a Local Planning Policy. That would likely, however, affect the timing of the gazettal of Local Planning Scheme No. 21.

TIMELINE FOR IMPLEMENTATION OF OFFICER RECOMMENDATION

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The proposed amendment will be forwarded to the Western Australian Planning Commission for endorsement within one month of the Council making a resolution in accordance with the officer recommendation.

OFFICER RECOMMENDATION

That the Council -

- Pursuant to Part V of the Planning and Development Act 2005, and having considered the submissions lodged during the advertising period, adopts Amendment No. 146 to the City of Busselton District Town Planning Scheme No. 20 inclusive of the recommended modifications following advertising for final approval, for the purposes of:
 - a. Amending the Scheme text by -
 - Inserting a new Clause 34 within Part 4 (Zones and Land Use) generally as follows -
 - "34. WESTERN RINGTAIL POSSUM HABITAT PROTECTION AREA
 - (1) This clause applies to all land shown on the Scheme Map as being within the Western Ringtail Possum Habitat Protection area.
 - (2) The objective of the Western Ringtail Possum Habitat Protection area is to ensure the protection of Western Ringtail Possum habitat in the identified parts of the Busselton and Dunsborough urban areas, which contain a significant proportion of the most important habitat for the species, whilst also facilitating the continuing and ongoing redevelopment and consolidation of urban development within those areas consistent with the broader objectives of this Scheme.
 - (3) The determination of the area of core habitat for the purposes of clause (4) (8) below shall be based on the extent of the horizontal plane of the canopy.
 - (4) Notwithstanding any other provision of this Scheme no person shall on any land in the Western Ringtail Possum Habitat Protection area clear any core habitat of a generally contiguous area of greater than $100m^2$ without the consent of the Council, unless it is essential for achieving adequate fire protection, or the vegetation is posing an immediate threat to life or property. The Council may require that the person that cleared the core habitat reasonably demonstrate that the clearing was necessary for those purposes.
 - (5) The Council shall not refuse an application to clear core habitat where the clearing is necessary to allow for development otherwise permissible pursuant to the Scheme, but prior to approving an application the Council shall ensure

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that the applicant has been provided information on the incentives allowed by virtue of sub-clauses (6), (7) and (8) below, and shall only approve clearing subject to conditions requiring –

- (a) The clearing to be undertaken in accordance with Western Ringtail Possum Habitat Clearing procedures as adopted by the Council; and
- (b) Prior to the clearing occurring, the implementation of offset planting in accordance with requirements outlined by the Council; or
- (c) An applicant may, in lieu of offset planting requirements pursuant to (b) above, make a cash contribution toward future core habitat planting equivalent to the otherwise required offset planting and equal to the Council's estimated cost of undertaking that future planting, including the maintenance of that planting for the first two years; and
- (d) The Council may only apply cash contributions pursuant to (c) above, including any interest earned thereon, for the purposes of planting and enhancement of core habitat in accordance with an adopted strategy and may only take cash contributions in lieu of offset planting pursuant to (c) above where it is less than or equivalent to the core habitat that the Council has planted after 31 December 2010.
- (6) Where a site contains core habitat at the time an application is received for development of the site, the Council may consent to variations to development standards, including the development standards established by the Residential Design Codes of Western Australia, including permissible development density in terms of dwelling units per hectare or plot ratio where the variations are considered by the Council to be consistent with the amenity of the locality and taking into account the value of the core habitat, up to the following maxima
 - (a) Where 100 square metres or more of core habitat is being retained on the site, protected and maintained in perpetuity by virtue of a core habitat protection covenant to the benefit of the Council, and the covenant is in place prior to the commencement of development, an increase in permissible development density equivalent to a 50% increase over the otherwise permissible development density over the whole of the site, including the area occupied by core habitat that is being retained; or
 - (b) Where 100 square metres or more of core habitat is present on the site but 100 square metres of core habitat is not being retained on the site, an increase in permissible development density equivalent to a 25% increase over the otherwise permissible development density.

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- (c) Variations to development standards approved by the Council pursuant to sub-clauses (a) and (b) above may not be applied to a development where Clause 58 (a), (b) or (c) is being applied.
- Renumbering subsequent clauses and internal referencing accordingly;

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 Inserting a new interpretation into Part 13 (Schedules), Schedule 1 (Interpretations), as follows –

"Core habitat" means WA Peppermint tree(s) (Agonis flexuosa) which may include associated, endemic understorey plants.

- Amending the Scheme map by identifying a 'Western Ringtail Possum Habitat Protection area' in accordance with the Scheme Amendment Map.
- Endorses the Schedule of Submissions prepared in response to the community consultation undertaken in relation to draft Amendment 146.
- Refers draft Amendment 146 to the City of Busselton District Town Planning Scheme No. 20, so adopted for final approval, to the Western Australian Planning Commission with a request for the approval of the Hon. Minister for Planning.
- 4. That, where notification is received from the Western Australian Planning Commission that a modification of the Amendment is required prior to approval of the Amendment by the Minister, this modification is to be undertaken in accordance with the requirements of the Town Planning Regulations 1967, unless the modification affects the intent of the Amendment, in which case it shall be referred to the Council for consideration.

Note: Officers provided a Revised Officer Recommendation with a revised Scheme Amendment Map being presented to Council. An additional map was required that was inclusive of the proposed modifications documented in the report. The map was included as part of the alternative motion and the officer recommendation proposed to be amended to refer to the revised version of the Scheme Amendment map.

REVISED OFFICER RECOMMENDATION

That the Council -

- Pursuant to Part V of the Planning and Development Act 2005, and having considered the submissions lodged during the advertising period, adopts Amendment No. 146 to the City of Busselton District Town Planning Scheme No. 20 inclusive of the recommended modifications following advertising for final approval, for the purposes of:
 - a. Amending the Scheme text by
 - Inserting a new Clause 34 within Part 4 (Zones and Land Use) generally as follows -

"34. WESTERN RINGTAIL POSSUM HABITAT PROTECTION AREA

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- (1) This clause applies to all land shown on the Scheme Map as being within the Western Ringtail Possum Habitat Protection area.
- (2) The objective of the Western Ringtail Possum Habitat Protection area is to ensure the protection of Western Ringtail Possum habitat in the identified parts of the Busselton and Dunsborough urban areas, which contain a significant proportion of the most important habitat for the species, whilst also facilitating the continuing and ongoing redevelopment and consolidation of urban development within those areas consistent with the broader objectives of this Scheme.
- (3) The determination of the area of core habitat for the purposes of clause (4) (8) below shall be based on the extent of the horizontal plane of the canopy.
- (4) Notwithstanding any other provision of this Scheme no person shall on any land in the Western Ringtail Possum Habitat Protection area clear any core habitat of a generally contiguous area of greater than $100m^2$ without the consent of the Council, unless it is essential for achieving adequate fire protection, or the vegetation is posing an immediate threat to life or property. The Council may require that the person that cleared the core habitat reasonably demonstrate that the clearing was necessary for those purposes.
- (5) The Council shall not refuse an application to clear core habitat where the clearing is necessary to allow for development otherwise permissible pursuant to the Scheme, but prior to approving an application the Council shall ensure that the applicant has been provided information on the incentives allowed by virtue of sub-clauses (6), (7) and (8) below, and shall only approve clearing subject to conditions requiring
 - (a) The clearing to be undertaken in accordance with Western Ringtail Possum Habitat Clearing procedures as adopted by the Council; and
 - (b) Prior to the clearing occurring, the implementation of offset planting in accordance with requirements outlined by the Council; or
 - (c) An applicant may, in lieu of offset planting requirements pursuant to (b) above, make a cash contribution toward future core habitat planting equivalent to the otherwise required offset planting and equal to the Council's estimated cost of undertaking that future planting, including the maintenance of that planting for the first two years; and
 - (d) The Council may only apply cash contributions pursuant to (c) above, including any interest earned thereon, for the purposes of planting and enhancement of core habitat in accordance with an adopted strategy and may only take cash contributions in lieu of offset planting pursuant to (c) above where it is less than or

equivalent to the core habitat that the Council has planted after 31 December 2010.

- (6) Where a site contains core habitat at the time an application is received for development of the site, the Council may consent to variations to development standards, including the development standards established by the Residential Design Codes of Western Australia, including permissible development density in terms of dwelling units per hectare or plot ratio where the variations are considered by the Council to be consistent with the amenity of the locality and taking into account the value of the core habitat, up to the following maxima
 - (a) Where 100 square metres or more of core habitat is being retained on the site, protected and maintained in perpetuity by virtue of a core habitat protection covenant to the benefit of the Council, and the covenant is in place prior to the commencement of development, an increase in permissible development density equivalent to a 50% increase over the otherwise permissible development density over the whole of the site, including the area occupied by core habitat that is being retained; or
 - (b) Where 100 square metres or more of core habitat is present on the site but 100 square metres of core habitat is not being retained on the site, an increase in permissible development density equivalent to a 25% increase over the otherwise permissible development density.
 - (c) Variations to development standards approved by the Council pursuant to sub-clauses (a) and (b) above may not be applied to a development where Clause 58 (a), (b) or (c) is being applied.
 - Renumbering subsequent clauses and internal referencing accordingly;
 - Inserting a new interpretation into Part 13 (Schedules), Schedule 1 (Interpretations), as follows –
 - "Core habitat" means WA Peppermint tree(s) (Agonis flexuosa) which may include associated, endemic understorey plants.
- 1b. Amending the Scheme map by identifying a 'Western Ringtail Possum Habitat Protection area' in accordance with the revised Scheme Amendment Map (Revision 3 - dated 11 December 2012).
- Endorses the Schedule of Submissions prepared in response to the community consultation undertaken in relation to draft Amendment 146, noting that Officers will update the responses to reflect the decision of the Council prior to forwarding Amendment 146 to the Western Australian Planning Commission for their consideration.

Refers draft Amendment 146 to the City of Busselton District Town Planning Scheme No. 20, so adopted for final approval, to the Western Australian Planning Commission with a request for the approval of the Hon. Minister for Planning.

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4. That, where notification is received from the Western Australian Planning Commission that a modification of the Amendment is required prior to approval of the Amendment by the Minister, this modification is to be undertaken in accordance with the requirements of the Town Planning Regulations 1967, unless the modification affects the intent of the Amendment, in which case it shall be referred to the Council for consideration.

Note:

Councillor David Reid put forward an additional recommendation (5) for Council's Consideration to increase the number of peppermint trees within the core and primary corridor an offer by the City of 2 trees to new home constructions within the area would act as a low cost scheme to encourage the planting of peppermint trees.

MOTION

Moved Councillor Reid, seconded Councillor Green:

That the Council -

- Pursuant to Part V of the *Planning and Development Act 2005*, and having considered the submissions lodged during the advertising period, adopts Amendment No. 146 to the City of Busselton District Town Planning Scheme No. 20 inclusive of the recommended modifications following advertising for final approval, for the purposes of:
 - a. Amending the Scheme text by -
 - Inserting a new Clause 34 within Part 4 (Zones and Land Use) generally as follows -
 - "34. WESTERN RINGTAIL POSSUM HABITAT PROTECTION AREA
 - (1) This clause applies to all land shown on the Scheme Map as being within the Western Ringtail Possum Habitat Protection area.
 - (2) The objective of the Western Ringtail Possum Habitat Protection area is to ensure the protection of Western Ringtail Possum habitat in the identified parts of the Busselton and Dunsborough urban areas, which contain a significant proportion of the most important habitat for the species, whilst also facilitating the continuing and ongoing redevelopment and consolidation of urban development within those areas consistent with the broader objectives of this Scheme.
 - (3) The determination of the area of core habitat for the purposes of clause (4)
 (8) below shall be based on the extent of the horizontal plane of the canopy.
 - (4) Notwithstanding any other provision of this Scheme no person shall on any land in the Western Ringtail Possum Habitat Protection area clear any core habitat of a generally contiguous area of greater than 100m² without the

consent of the Council, unless it is essential for achieving adequate fire protection, or the vegetation is posing an immediate threat to life or property. The Council may require that the person that cleared the core habitat reasonably demonstrate that the clearing was necessary for those purposes.

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- (5) The Council shall not refuse an application to clear core habitat where the clearing is necessary to allow for development otherwise permissible pursuant to the Scheme, but prior to approving an application the Council shall ensure that the applicant has been provided information on the incentives allowed by virtue of sub-clauses (6), (7) and (8) below, and shall only approve clearing subject to conditions requiring
 - (a) The clearing to be undertaken in accordance with Western Ringtail Possum Habitat Clearing procedures as adopted by the Council; and
 - (b) Prior to the clearing occurring, the implementation of offset planting in accordance with requirements outlined by the Council; or
 - (c) An applicant may, in lieu of offset planting requirements pursuant to (b) above, make a cash contribution toward future core habitat planting equivalent to the otherwise required offset planting and equal to the Council's estimated cost of undertaking that future planting, including the maintenance of that planting for the first two years; and
 - (d) The Council may only apply cash contributions pursuant to (c) above, including any interest earned thereon, for the purposes of planting and enhancement of core habitat in accordance with an adopted strategy and may only take cash contributions in lieu of offset planting pursuant to (c) above where it is less than or equivalent to the core habitat that the Council has planted after 31 December 2010.
- (6) Where a site contains core habitat at the time an application is received for development of the site, the Council may consent to variations to development standards, including the development standards established by the Residential Design Codes of Western Australia, including permissible development density in terms of dwelling units per hectare or plot ratio where the variations are considered by the Council to be consistent with the amenity of the locality and taking into account the value of the core habitat, up to the following maxima
 - (a) Where 100 square metres or more of core habitat is being retained on the site, protected and maintained in perpetuity by virtue of a core habitat protection covenant to the benefit of the Council, and the covenant is in place prior to the commencement of development, an increase in permissible development density equivalent to a 50% increase over the otherwise permissible development density over the whole of the site, including the area occupied by core habitat that is being retained; or

13.1 Attachment B

Final Council report for Amendment 146 to Town Planning Scheme No. 20

- (b) Where 100 square metres or more of core habitat is present on the site but 100 square metres of core habitat is not being retained on the site, an increase in permissible development density equivalent to a 25% increase over the otherwise permissible development density.
- (c) Variations to development standards approved by the Council pursuant to sub-clauses (a) and (b) above may not be applied to a development where Clause 58 (a), (b) or (c) is being applied.
- Renumbering subsequent clauses and internal referencing accordingly;
- ii. Inserting a new interpretation into Part 13 (Schedules), Schedule 1 (Interpretations), as follows –

"Core habitat" means WA Peppermint tree(s) (Agonis flexuosa) which may include associated, endemic understorey plants.

- Amending the Scheme map by identifying a 'Western Ringtail Possum Habitat Protection area' in accordance with the revised Scheme Amendment Map (Revision 3 - dated 11 December 2012).
- Endorses the Schedule of Submissions prepared in response to the community consultation undertaken in relation to draft Amendment 146, noting that Officers will update the responses to reflect the decision of the Council prior to forwarding Amendment 146 to the Western Australian Planning Commission for their consideration.
- Refers draft Amendment 146 to the City of Busselton District Town Planning Scheme No. 20, so adopted for final approval, to the Western Australian Planning Commission with a request for the approval of the Hon. Minister for Planning.
- 4. That, where notification is received from the Western Australian Planning Commission that a modification of the Amendment is required prior to approval of the Amendment by the Minister, this modification is to be undertaken in accordance with the requirements of the Town Planning Regulations 1967, unless the modification affects the intent of the Amendment, in which case it shall be referred to the Council for consideration.
- That the City of Busselton offer 2 Peppermint trees (Agonis Flexuosa) free of charge to all new home owner constructions within the core habitat and primary corridor areas of Western Ringtail Possum protection areas (areas 1 and 2). The funds to be drawn from the cash in lieu (peppermint account).

AMENDMENT

Moved Councillor Binks, seconded Councillor Green:

That Recommendation 5 be amended to allow the City of Busselton to offer 2 Peppermint trees (Agonis Flexuosa) or other appropriate species.

CARRIED 6/1

FOR	AGAINST
Cr Tarbotton	Cr Stubbs
Cr Reid	
Cr McCallum	
Cr Green	
Cr Bleechmore	
Cr Binks	

COUNCIL DECISION

C1212/357 Moved Councillor Tarbotton, seconded Councillor Reid:

That the Council -

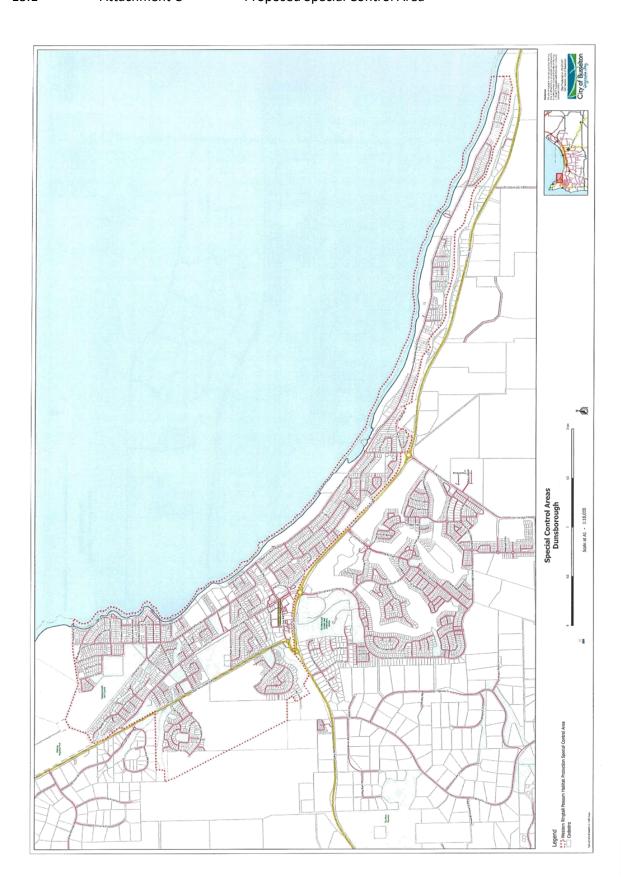
- Pursuant to Part V of the Planning and Development Act 2005, and having considered the submissions lodged during the advertising period, adopts Amendment No. 146 to the City of Busselton District Town Planning Scheme No. 20 inclusive of the recommended modifications following advertising for final approval, for the purposes of:
 - a. Amending the Scheme text by
 - Inserting a new Clause 34 within Part 4 (Zones and Land Use) generally as follows -
 - "34. WESTERN RINGTAIL POSSUM HABITAT PROTECTION AREA
 - (1) This clause applies to all land shown on the Scheme Map as being within the Western Ringtail Possum Habitat Protection area.
 - (2) The objective of the Western Ringtail Possum Habitat Protection area is to ensure the protection of Western Ringtail Possum habitat in the identified parts of the Busselton and Dunsborough urban areas, which contain a significant proportion of the most important habitat for the species, whilst also facilitating the continuing and ongoing redevelopment and consolidation of urban development within those areas consistent with the broader objectives of this Scheme.
 - (3) The determination of the area of core habitat for the purposes of clause (4) (8) below shall be based on the extent of the horizontal plane of the canopy.
 - (4) Notwithstanding any other provision of this Scheme no person shall on any land in the Western Ringtail Possum Habitat Protection area clear any core

habitat of a generally contiguous area of greater than 100m² without the consent of the Council, unless it is essential for achieving adequate fire protection, or the vegetation is posing an immediate threat to life or property. The Council may require that the person that cleared the core habitat reasonably demonstrate that the clearing was necessary for those purposes.

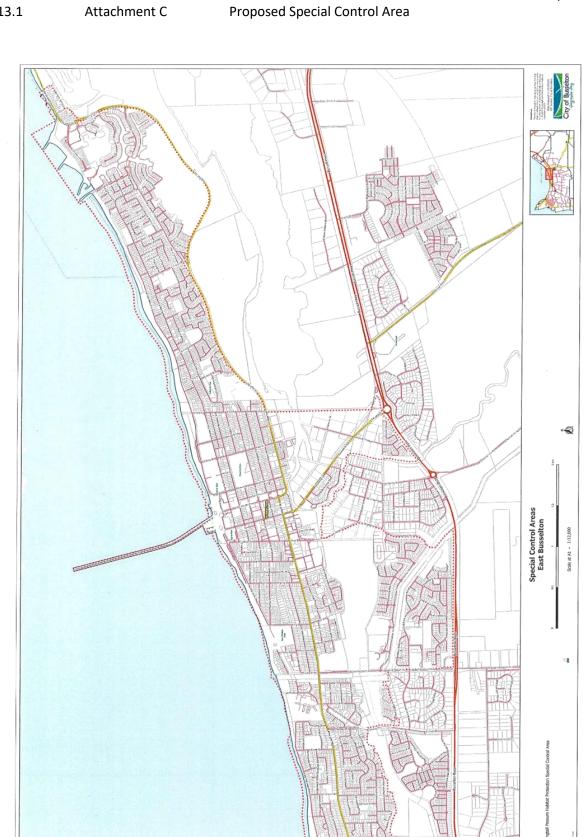
- (5) The Council shall not refuse an application to clear core habitat where the clearing is necessary to allow for development otherwise permissible pursuant to the Scheme, but prior to approving an application the Council shall ensure that the applicant has been provided information on the incentives allowed by virtue of sub-clauses (6), (7) and (8) below, and shall only approve clearing subject to conditions requiring
 - (a) The clearing to be undertaken in accordance with Western Ringtail Possum Habitat Clearing procedures as adopted by the Council; and
 - (b) Prior to the clearing occurring, the implementation of offset planting in accordance with requirements outlined by the Council; or
 - (c) An applicant may, in lieu of offset planting requirements pursuant to (b) above, make a cash contribution toward future core habitat planting equivalent to the otherwise required offset planting and equal to the Council's estimated cost of undertaking that future planting, including the maintenance of that planting for the first two years; and
 - (d) The Council may only apply cash contributions pursuant to (c) above, including any interest earned thereon, for the purposes of planting and enhancement of core habitat in accordance with an adopted strategy and may only take cash contributions in lieu of offset planting pursuant to (c) above where it is less than or equivalent to the core habitat that the Council has planted after 31 December 2010.
- (6) Where a site contains core habitat at the time an application is received for development of the site, the Council may consent to variations to development standards, including the development standards established by the Residential Design Codes of Western Australia, including permissible development density in terms of dwelling units per hectare or plot ratio where the variations are considered by the Council to be consistent with the amenity of the locality and taking into account the value of the core habitat, up to the following maxima -
 - (a) Where 100 square metres or more of core habitat is being retained on the site, protected and maintained in perpetuity by virtue of a core habitat protection covenant to the benefit of the Council, and the covenant is in place prior to the commencement of development, an increase in permissible development density equivalent to a 50% increase over the otherwise permissible development density over the whole of the site, including the area occupied by core habitat that is being retained; or

- (b) Where 100 square metres or more of core habitat is present on the site but 100 square metres of core habitat is not being retained on the site, an increase in permissible development density equivalent to a 25% increase over the otherwise permissible development density.
- (c) Variations to development standards approved by the Council pursuant to sub-clauses (a) and (b) above may not be applied to a development where Clause 58 (a), (b) or (c) is being applied.
- Renumbering subsequent clauses and internal referencing accordingly;
- ii. Inserting a new interpretation into Part 13 (Schedules), Schedule 1 (Interpretations), as follows
 - "Core habitat" means WA Peppermint tree(s) (Agonis flexuosa) which may include associated, endemic understorey plants.
- Amending the Scheme map by identifying a 'Western Ringtail Possum Habitat Protection area' in accordance with the revised Scheme Amendment Map (Revision 3 - dated 11 December 2012).
- Endorses the Schedule of Submissions prepared in response to the community consultation undertaken in relation to draft Amendment 146, noting that Officers will update the responses to reflect the decision of the Council prior to forwarding Amendment 146 to the Western Australian Planning Commission for their consideration.
- Refers draft Amendment 146 to the City of Busselton District Town Planning Scheme No. 20, so adopted for final approval, to the Western Australian Planning Commission with a request for the approval of the Hon. Minister for Planning.
- 4. That, where notification is received from the Western Australian Planning Commission that a modification of the Amendment is required prior to approval of the Amendment by the Minister, this modification is to be undertaken in accordance with the requirements of the Town Planning Regulations 1967, unless the modification affects the intent of the Amendment, in which case it shall be referred to the Council for consideration.
- 5. That the City of Busselton offer 2 Peppermint trees (Agonis Flexuosa) or other appropriate species, free of charge to all new home owner constructions within the core habitat and primary corridor areas of Western Ringtail Possum protection areas (areas 1 and 2). The funds to be drawn from the cash in lieu (peppermint account).

CARRIED 7/0







13.2 PROPOSED STRUCTURE PLAN FOR PART LOT 9002 LAYMAN ROAD, GEOGRAPHE ('NEWPORT GEOGRAPHE') - CONSIDERATION FOR FINAL ADOPTION FOLLOWING ADVERTISING

SUBJECT INDEX: Structure Plans, Local Development Plans and Activity Centre Plans
STRATEGIC OBJECTIVE: Planning strategies that foster the development of healthy

neighbourhoods that meet our needs as we grow.

BUSINESS UNIT: Strategic Planning ACTIVITY UNIT: Strategic Planning

REPORTING OFFICER: Senior Strategic Planner - Helen Foulds

AUTHORISING OFFICER: Director, Planning and Development Services - Paul Needham

VOTING REQUIREMENT: Simple Majority

ATTACHMENTS: Attachment A Port Geographe Development Plan

Attachment B Location Plan !!

Attachment C Aerial !!

Attachment D Proposed Structure Plan Map.

Attachment E Area 2 Concept Plan Attachment F POS Annotated

Attachment G JDA Report October 2017 Part A (see Part B at

Attachment M) !

Attachment J Schedule of Submissions Agencies DP18 0001

Attachment K Schedule of Modifications DP18-0001

Attachment L Modifications to SP Sketch. Attachment M JDA Report October 2017 Part B.

PRÉCIS

The Council is requested to consider adopting for final approval a Structure Plan for Part Lot 9002 Layman Road, Geographe, an area now being marketed as 'Newport Geographe'. The proposal aims to guide the future subdivision and development of the subject land and will supersede the existing Port Geographe Development Plan as it relates to the subject area.

A number of outstanding issues remain in association with the Structure Plan proposal, including issues that have arisen through technical assessment and / or were raised during the formal advertising period. It is recommended that the Council recommend that the Structure Plan be forwarded for consideration for approval by the Western Australian Planning Commission (WAPC), subject to prior resolution of the identified issues.

BACKGROUND

The land within the Port Geographe area was first zoned for development by Amendment No. 362 to Town Planning Scheme No. 5. That Amendment was gazetted on 27 September 1996. The Amendment rezoned the area to 'Port Geographe Residential', 'Port Geographe Business', 'Port Geographe Tourist', 'Recreation' and 'Public Utilities', and included the 'Village Centre' in the 'Port Geographe Village Centre Precinct'.

District Town Planning Scheme No. 20 was gazetted on 7 September 1999, revoking Scheme No. 5, and zoning the Port Geographe area 'Business', 'Tourist' and 'Residential' (which applied to most of the subject area - with various residential density codes applied) and 'Recreation' reserves; and including it in the 'Port Geographe Development Area' and a small portion within a 'Special Provision' area. This zoning pattern was incorporated in essentially unchanged form when the Local Planning Scheme No. 21 (Scheme) was gazetted on 15 October 2014.

The Port Geographe Development Plan was included in the original rezoning documentation (gazetted in 1996) to guide the subdivision and development of Port Geographe. A number of modifications to the Development Plan have since taken place, with the current version being endorsed by the WAPC on 19 December 2008 (see Attachment A).

The proposed Structure Plan relates to Part Lot 9002 Layman Road, Geographe (previously Lot 9507) within an area currently marketed as 'Newport Geographe', being the undeveloped southern portion of the Port Geographe Development Area. A Location Plan and Aerial Photograph are provided as Attachments B and C respectively.

Lot 9002 (53.8ha) is zoned 'Residential R15', 'Residential R20', 'Residential R20', 'Reserve for Recreation' and 'Reserve for Public Purposes' and included within the 'Port Geographe Development Area' designated in the Scheme. The current zoning reflects the layout within the existing Port Geographe Development Plan, which includes further extensions of the canals, a large lake and active public open space co-located with a 2,000m² Community Purpose lot.

Proposed Scheme Amendment 28, which was approved by the Council for initiation for public consultation at the meeting of 13 April 2018 (C1804/077), proposes to include Lot 9002 in an 'Urban Development' zone. The intent of that was and is to allow the Structure Plan to be assessed and implemented in a manner consistent with other urban growth areas in the City. Amendment 28 also proposes to apply Special Provision Area 69 to the land, which will specify the requirement for a Structure Plan and Development Contribution Plan to be prepared and adopted prior to any subdivision or other development being carried out. Amendment 28 is now awaiting WAPC consent to advertise (note that, whilst it was initiated in April 2018, it took many months for the City to satisfy the Environmental Protection Authority (EPA) that the amendment did not require formal environmental review, and had been awaiting WAPC consideration for around two months at the time of writing).

Stage 1 of subdivision of Newport Geographe has recently been developed, with titles being issued for 70 residential lots, a 5180m² area of public open space and two new entry roads into the development.

The Proposal

The proposed Structure Plan is provided at Attachment D. The Newport Geographe development has effectively been divided into two areas: Area 1, to which this proposed Structure Plan relates; and future Area 2, which will likely include a 'Waterfront Activity Node' and incorporate mixed use development, along with an extension of the existing canals. A concept plan is provided at Attachment E for the purposes of illustrating Area 2.

It is understood that, in part at least, given the potential complexities associated with flushing of the canals and maintaining an appropriate level of water quality, the proponent has designed the Structure Plan for Area 1 to provide a predominantly 'dry lot' development. As the land was significantly altered by the previous developer by the commencement of the construction of further canals, a substantial amount of fill and compaction is required at each stage. Prior to submitting a structure plan proposal for Area 2, further investigations are expected to be undertaken by the proponent and it is likely that such information will inform a revision to the Structure Plan at a later time, to incorporate the land within Area 2.

Key elements of the proposed Newport Geographe Structure Plan are described below under appropriate subheadings.

Residential

Overall, the proposed Structure Plan indicates the development of 613 residential lots (potentially 728 dwellings) within Area 1. A variety of residential densities is proposed throughout the Structure Plan area to provide for housing diversity, and density ranges, rather than specific densities being proposed at this stage of the planning process. This is becoming a common approach, and allows for flexibility in determining the final R-Code that will be applied and determined closer to the time of subdivision. The density ranges proposed are a low density range R15-R20 to tie into existing development, medium density ranges of R25-R40 and R40-R60, and a higher density range R80-R100 near the Waterfront Activity Node.

A Residential Density Code Plan is intended to be submitted at the time of application for subdivision approval and will indicate the density code applicable to each lot within the proposed subdivision. Once endorsed by the WAPC, the Residential Density Code Plan shall then form part of the Structure Plan for publication by the WAPC and be used for the determination of further development and building permit applications.

Road and Path Network

The Structure Plan area is intended to be connected to the surrounding neighbourhoods by several entry roads from Navigation Way and Layman Road, and also through the extension of the roads from the existing residential area to the north. The internal road network consists of a series of interconnected streets and is based on Liveable Neighbourhoods recommendations for road hierarchies. A footpath would be provided along at least one side of all access streets and adjacent to Public Open Space (POS).

Public Open Space

The Structure Plan proposes a network of POS of varying forms and functions. The proponent requests consideration for an undersupply of the POS provision, which is estimated to be a 1.5% undersupply when Area 2 is included. This matter is discussed in detail in the 'Officer Comment' section of this report.

Although located outside of the specified Structure Plan area, the POS calculation has included POS 1, which was provided with the Stage 1 subdivision (refer to Attachment F). It was agreed between City officers and the proponent that, whilst outside the effective Structure Plan area, Stage 1 is part of the overall estate and the contribution of POS 1 to the estate is acknowledged. This significant portion of POS will likely be used by residents from both Stage 1 and future stages to the east.

Supporting Technical Assessments

Technical reports provided in support of the proposal include:

- Environmental Assessment Report
- Local Water Management Strategy
- Bushfire Management Plan
- Engineering Infrastructure Report
- Transport Impact Assessment
- Landscape Strategy

Each of these is outlined below.

Environmental Assessment Report

The Environmental Assessment Report addresses the following matters:

- Acid Sulfate Soils (ASS) the majority of the site has been identified as having a 'high to
 moderate risk of ASS occurring within 3 metres of the natural soil surface'. An ASS selfassessment form will be completed for the site once detailed engineering design has been
 undertaken. This will inform assessment of ASS risk and whether more detailed investigations
 will be required.
- Groundwater quality and management Additional groundwater monitoring bores have been installed since initial monitoring was undertaken on site between 2006 and 2008. The management of surface water and groundwater is addressed in the Local Water Management Strategy (LWMS). Lot 9002 is located entirely within a Multiple Use Wetland. The Vasse-Wonnerup Estuary, located to the south of the site, is a Conservation Category Wetland and is Ramsar listed. The subject site is listed under the Directory of Important Wetlands 'Vasse-Wonnerup Wetland System' which covers a large portion of land along the coastline from Forrest Beach to Busselton and includes areas that have already been developed for residential purposes.
- Flora and vegetation the predominant vegetation is Samphire (*Tecticornia* spp.) and various exotic weeds. A 'likelihood assessment' identified that no conservation significant flora species are considered likely to occur within the site due to its highly disturbed state. A Federal database search identified one Threatened Ecological Community (TEC) as occurring within one kilometre of the site, being Subtropical and Temperate Coastal Saltmarsh. It is considered that the site is unlikely to contain a TEC or Declared Rare Flora due to its disturbed nature and the lack of remnant vegetation.
- Fauna management The conservation significant fauna species considered likely to occur within the site are waders and other waterbirds. These species would also inhabit the extensive Vasse-Wonnerup Estuary immediately to the south of the site. Therefore it is considered unlikely that developing the site will impact on the population of any conservation significant fauna species, and impacts of that kind were in any case considered when the original rezoning proposal for the Port Geographe development was considered by the EPA. The existing waterbodies within the site are also substantially artificial and not considered therefore to be a natural habitat for fauna species.
- Conservation Areas The site is classified as an Environmentally Sensitive Area (ESA) as it is listed under the Directory of Important Wetlands (Vasse-Wonnerup Wetland System) as well as the now closed Register of the National Estate. The Vasse-Wonnerup Wetland System is extensive and covers a large portion of the City, which includes residential development in close proximity to the Vasse-Wonnerup Estuary. An un-named Department of Biodiversity, Conservation and Attractions (DBCA) managed Reserve exists to the south of Layman Road, approximately 25 metres south of the site. Ngari Capes Marine Park, also managed by DBCA, exists 880 metres north-west of the site. Sabina Nature Reserve is approximately 750 metres south of the site, adjacent to the Vasse-Wonnerup Estuary.
- Heritage A search of the Department of Aboriginal Affair's (DAA) Aboriginal Heritage Inquiry
 System identified that the buffer for the closest heritage site falls within Lot 9002, with the
 actual site being located well outside the boundary of Lot 9002, about 210 metres to the east.
 This site was identified as the Korilya Stud Skeletal material/Burial Site (Place ID4932) and has
 since been relocated for reburial within the Shire of Capel.

No known heritage places have been identified within the subject site. As the boundary of this Site (ID 4932) still exists on the eastern portion of the site, liaison with the DAA would be expected to occur during the structure planning of Area 2 to clarify and confirm any further requirements.

Local Water Management Strategy

The Local Water Management Strategy (LWMS) sets out recommendations in relation to stormwater, flood and water quality management, as well as water source and sustainability initiatives, outlined below:

- Groundwater Due to the site being highly disturbed, the hydrology has been substantially altered. Groundwater levels across the site range between -0.09mAHD and 0.94mAHD, varying approximately 1.3 metres above and below ground surface level. The site's close proximity to the coast results in the expectation that groundwater levels will be largely influenced by, and be of similar levels to, sea levels.
- Groundwater quality Groundwater quality monitoring found nutrient levels to be relatively
 high across the site. The area adjacent to the subject site has experienced severe nutrient
 problems for many years as a result of urbanisation and agricultural activity leading to high
 nutrient load discharges to the Vasse-Wonnerup Estuary. The water quality objectives for
 recovery of the system are to markedly reduce nutrients (winter concentrations of nitrogen
 and phosphorus), but these targets have not as yet been met.

Development of the Structure Plan area will be designed to minimise impacts on water quality in the Vasse-Wonnerup Estuary and achieved through nutrient treatment management measures. The proposed Structure Plan does not alter the existing arrangements to protect the Estuary and drainage from the development will be directed towards the canal system rather than into the Estuary.

- Surface water Surface water exists within the subject site in the form of the previously excavated canals. A number of catchments to the north of the subject site discharge stormwater into these excavated areas.
- Flood levels The site is subject to risks of storm surge, flooding from the Vasse-Wonnerup Estuary, as well as sea level rise. The proponent's proposed minimum residential finished floor level is 2.5mAHD, based on the report Interaction of Coastal and Catchment Floods for Determining Port Geographe Finished Floor Levels, provided at Attachment G. Note that relevant independent advice was provided to the City and included as Attachment H. This matter is discussed in further detail later in this report.
- Stormwater Management The LWMS has been prepared in accordance with Better Urban Water Management (BUWM). Stormwater events will be managed via infiltration within POS areas to minimise fill levels and requirements for separation to groundwater. The LWMS proposes that lots will be connected to the road network and stormwater managed in POS areas. Runoff generated in events greater than the first 15mm is proposed to be collected into two drainage swales in the POS areas and discharged unattenuated in to the marina. POS areas will be designed such that the areas will be usable for public recreation most of the time.

Bushfire Management Plan

The Bushfire Management Plan (BMP) identifies that portions of the subject site are designated as bushfire prone on the WA Map of Bush Fire Prone Areas. However, all of the proposed development areas have the capacity to be located within areas of Bushfire Attack Level (BAL) 12.5 or lower, and are not considered to be subject to a significant bushfire hazard risk.

Engineering Infrastructure Report

The Engineering Infrastructure Report provides advice on the capability and future infrastructure requirements of the subject site to support the proposed urban development. Earthworks, roadworks, drainage, water reticulation, waste water reticulation, gas reticulation, underground power supply and communication servicing have all been addressed in support of the proposed development.

Transport Impact Assessment

The Transport Impact Assessment (TIA) considered the following matters:

- The capacity of the local road network to accommodate the change in traffic generated by the proposal.
- The extent to which the additional traffic generated can be safely managed on the adjacent existing and future road network.
- The provision of safe access to the proposed subdivision from the adjacent road network.
- The safety and efficiency of the proposed internal road network, including the accommodation of pedestrians and cyclists.

The TIA states that the proposed road network will allow for efficient distribution of traffic onto the external transport system. The TIA concludes that the proposed road network is adequate to accommodate the expected volume of traffic generated by the proposed development of the structure plan area. The internal path network shall consist of at least one footpath along all roads except for laneways.

Landscape Strategy

A Landscape Strategy accompanied the application to provide an assessment of how the POS areas and streetscapes may be developed. Street tree planting will be provided along access streets and avenue tree planting will be provided along the estate entry roads. Layman Road reserve verges will be planted with a groundcover at the site's perimeter. POS areas will include mounding and earthworks to create interest and incorporate a variety of plantings and grassed areas.

STATUTORY ENVIRONMENT

The key elements of the statutory environment with respect to this proposal are set out in the relevant objectives, policies and provisions of the City of Busselton *Local Planning Scheme 21* and the *Planning and Development (Local Planning Schemes) Regulations 2015* ('the Regulations').

Local Planning Scheme No. 21

The subject land is zoned 'Residential' with varying density codings of R15, R20 and R20/40 and is also located within the Port Geographe Development Area.

The Scheme requires, at clause 5.9.1, that in considering development within the Port Geographe Development Area (PGDA), the City is mindful of:

- (a) the need to ensure appropriate standards of development and maintenance are achieved;
- (b) the need to control and enhance the health, safety, convenience and general welfare and amenity of the locality; and
- (c) the need to ensure that development control within the PGDA is guided by the Port Geographe Development Plan, the Port Geographe Landscape Master Plan and the Port Geographe Village Centre Precinct Plan.

The Scheme at clause 5.9.2(a) also requires that subdivision and development be guided by the Port Geographe Development Plan, the Port Geographe Landscape Master Plan (which will become superfluous if the revised Structure Plan and associated Landscape Strategy are approved) and the Port Geographe Village Centre Precinct Plan (the latter not being relevant to this site).

The Development Area also requires:

- 5.9.2 ...
 - (o) The height of buildings on lots adjacent to the future Layman Road and Vasse Estuary shall be limited to 7.5 metres above the finished surface level of the land as specified on approved subdivisional engineering plans.
- 5.9.3 (a) Any modification to the Port Geographe Development Plan shall be subject to the provisions of Part 4 of the Deemed Provisions (relating to Structure Plans).
 - (b) Notwithstanding any modifications made pursuant to clause 5.9.3 (a) the Port Geographe Development Plan shall contain at least the following elements:
 - (i) The requirement for public open space for the development south of Layman Road in accordance with the Port Geographe Development Plan endorsed at the Gazettal date of the Scheme.
 - (ii) Provision of a high level of direct public access to waterways/canals.
 - (iii) A general presumption against residential lots backing onto conservation/foreshore reserves."

Amendment No. 28 to the Scheme proposes to create a new zone, 'Urban Development', consistent with the Regulations. The undeveloped areas of Port Geographe are proposed to be rezoned to Urban Development with a new Special Provision No. 69, including the area covered by the proposed Newport Geographe Structure Plan.

The Urban Development zone is proposed to align the zoning of the land, along with remaining development areas of the Scheme area, with the Regulations and required subdivision and development to be guided by a comprehensive structure plan.

As the 'Head of Power' for structure planning over this site will be changed by the rezoning of the land to Urban Development under Amendment 28, this Structure Plan could not be endorsed by the WAPC until Amendment 28 is endorsed by the Minister and published in the Government Gazette.

Planning and Development (Local Planning Schemes) Regulations 2015

The Regulations came into operational effect on 19 October 2015 and introduced 'Deemed Provisions' for the preparation, advertising and approval of structure plans (Part 4). The status of structure plans has also changed and local governments are to have 'due regard' to approved structure plans when making decisions relating to subdivision and development.

RELEVANT PLANS AND POLICIES

The key policies relevant to the current proposal are:

- State Planning Policy 2.6: State Coastal Planning;
- State Planning Policy 3: Urban Growth and Settlement;
- State Planning Policy 3.6: Development Contributions for Infrastructure;
- Liveable Neighbourhoods (2009) and draft Liveable Neighbourhoods (2015);
- Development Control Policy 2.2: Residential Subdivision;

- Development Control Policy 2.6: Residential Road Planning; and
- City of Busselton *Draft Local Planning Strategy*.

Each is addressed below under appropriate subheadings.

State Planning Policy 2.6: State Coastal Planning Policy (2013)

The purpose of *State Planning Policy 2.6: State Coastal Planning Policy* (SPP2.6) is to provide guidance for decision-making within the coastal zone and to protect, conserve and enhance coastal values. The policy requires that coastal hazard risk management and adaptation is appropriately planned for and encourages innovative approaches to managing coastal hazard risk.

The key objectives of the policy that relate to the proposal are:

- To ensure that development and the location of coastal facilities takes into account coastal processes, landform stability, coastal hazards, climate change and biophysical criteria; and
- To protect, conserve and enhance coastal zone values, particularly in areas of landscape, biodiversity and ecosystem integrity, indigenous and cultural significance.

One of the key aspects of SPP2.6 is the management of development in the vicinity of the coast, and especially consideration of risks that may arise to and from development in relation to coastal processes. Coastal processes include coastal erosion (i.e. more or less 'permanent' shifts in the coastline) and coastal inundation (i.e. temporary, flooding events).

An assessment of the proposal against SPP2.6 has been provided within the Officer Comment section below.

State Planning Policy 3: Urban Growth and Settlement (2006)

State Planning Policy 3: Urban Growth and Settlement aims to promote sustainable patterns of urban growth through the provision of a planning framework that sets out the requirements for sustainable settlements and communities. Officers consider the proposal is broadly consistent with the key objectives of the Statement of Planning Policy No.3: Urban Growth and Settlement.

State Planning Policy 3.6: Development Contributions for Infrastructure (2009)

State Planning Policy 3.6: Development Contributions for Infrastructure sets out the principles and considerations that apply to development contributions for the provision of infrastructure in new and established urban areas, and the form, content and process to be followed. The policy allows for local governments to enter into "voluntary arrangements" with developers for contributions for the provision of community infrastructure, in lieu of a formal Development Contribution Plan. There is an 'Interim Development Deed' relating to the site, which is considered to constitute an appropriate agreement in that respect.

Liveable Neighbourhoods (2009) and draft Liveable Neighbourhoods (2015)

Liveable Neighbourhoods (LN) is an adopted operational policy of the WAPC to guide structure planning and subdivision of new and infill urban areas. LN 2015 is a 'seriously entertained' draft policy and, as advised by the Department of Planning, Lands and Heritage (DPLH), should be referred to in order to provide guidance for the assessment and determination of this proposal (rather than the now outdated LN 2009).

Aspects of LN 2015 especially relevant to this proposal are as follows:

- Street layout to provide a movement network which has a highly-interconnected street
 network that clearly distinguishes between arterial routes and local streets, establishes good
 internal and external access for residents, encourages walking and cycling and minimises the
 impact of through traffic.
- Design for a range of housing products to provide a variety of lot sizes and housing types to cater for the diverse housing needs of the community at a density that can ultimately support the provision of local services.
- Public open space the key principle is the design and delivery of an integrated network of POS that provides communities with access to nature, sport and recreation. LN 2015 promotes variety in the function, use and size of public open spaces including district parks, neighbourhood parks, local parks and small parks that deliver sport spaces, recreation spaces and nature spaces.

For the reasons stated within the Officer Comment section of this report, the proposal is considered to be inconsistent with some requirements of LN 2015.

Development Control Policy 2.2: Residential Subdivision (2017)

Development Control Policy 2.2: Residential Subdivision assists to create a diversity of lot and housing types through subdivision of residential land. The policy ensures each residential lot has a suitable level of amenity, servicing and access, and facilitates the supply of residential lots in regular shapes and size ranges that reflect the statutory provisions of local planning schemes. The proposal meets the requirements of DC Policy 2.2.

Draft Local Planning Strategy (2016)

The draft Local Planning Strategy (LPS) sets out the long term planning direction for the City and provides an overarching, strategic rationale for decisions related to the planning and development of the District. The draft LPS establishes an urban growth area framework that identifies current (land that is already zoned and where development is generally progressing), medium term (not currently zoned or subject to structure planning) and long term (also not currently zoned or subject to structure planning) locations for growth.

The draft LPS identifies Port Geographe as a 'current' urban growth area, noting that land is already zoned with approved Structure Plans in place. The document also identifies that further development of Port Geographe may involve review of existing structure planning. Officers consider the proposal to be broadly consistent with the draft LPS.

FINANCIAL IMPLICATIONS

There are not considered to be any direct financial implications associated with the officer recommendation.

LONG-TERM FINANCIAL PLAN IMPLICATIONS

The resolution of floor levels and assessment of coastal inundation risk, whilst unlikely to have an impact within the ten year life of the City's current Long-Term Financial Plan, could have longer term financial implications for the City; associated with management of future storm surge events. It is not possible to clearly quantify those implications at this stage, but they could be substantial.

STRATEGIC COMMUNITY OBJECTIVES

The recommendation of officers provided in this report is consistent with Key Goal Area 2 – Places and Spaces and community objective 2.1 of the City's *Strategic Community Plan 2017*, which is – *'Planning strategies that foster the development of neighbourhoods that meet our needs as we grow'*.

RISK ASSESSMENT

An assessment of the potential implications of implementing the officer recommendation has been undertaken using the City's risk assessment framework. The assessment identified 'downside' risks only, rather than upside risks as well. In this regard, there are no significant risks identified.

It is noted that the officer recommendation addresses the adoption of the proposal for referral to the WAPC. In making a recommendation to the WAPC, however, the City will need to consider risks that may arise from the actual development that may follow approval of the Structure Plan by the WAPC. Key amongst those are risks associated with coastal processes, especially risks that may be associated with coastal storm surge events and potential climate change related sea level rise.

CONSULTATION

The draft Structure Plan was advertised for 28 days, in accordance with clause 18 of the Deemed Provisions, ending 19 December 2018. Twenty five public submissions were received with the majority generally supporting development on the site. Of these submissions, 22 either objected or had concerns with particular components within the proposed plan, while 3 supported the plan as advertised.

The three submissions in support of the proposal commented on the positive nature of the proposed traffic routes, boat launching and car parking facilities for the area.

The main issues raised during the submission period related to:

- the proposed increase in density from R20;
- the proposed height of buildings indicated within the concept drawings;
- the proposed traffic network, specifically the route using Ostia Way and Waterline View;
- the change from canals and man-made lake to 'dry lot' development; and
- the recommended FFL of 3.8mAHD, as suggested by State agencies.

These matters are discussed in the Officer Comment section below and in the Schedule of Submissions.

At the time of completing this report, whilst all submissions had been reviewed and taken into account in assessing the proposal and writing the report, the Schedule of Submissions table had not been finalised. In its place, the Schedule provided at Attachment J details the Agency submissions and a revised and complete Schedule of Submissions will be provided as a separate attachment prior to the agenda briefing session.

Nine submissions were received from State agencies, with Telstra, ATCO Gas, the Department of Education and the Water Corporation all having no objection to the proposal. The following agencies made specific comment on the proposal:

- Department of Water and Environmental Regulation (DWER) Advising that comments
 previously provided with regard to the LWMS still apply. The final agreed FFL will impact on
 water management for the development and the LWMS will need to be revised for approval
 prior to endorsement of the Structure Plan.
- Department of Transport, Coastal Infrastructure (DoT) Advising that the site is vulnerable
 to inundation by ocean flooding as it borders Vasse-Wonnerup Estuary to the south and is
 directly connected to the open ocean through the Port Geographe marina entrance. SPP 2.6
 requires consideration of coastal inundation risk caused by a 1 in 500yr tropical cyclone in
 the Busselton area over a 100yr planning timeframe. DoT reiterated previous advice that, in
 the absence of local tropical cyclone flood modelling, a FFL of at least 3.8mAHD would be
 necessary to prevent inundation over the planning timeframe.
- DPLH (Policy) Identifies the vulnerability of the site to coastal processes and acknowledges
 that development could be considered if the Structure Plan is able to demonstrate that
 inundation risk can be accommodated, e.g. by filling the site to an appropriate FFL. The DPLH
 submission provides a consistent recommendation to the DoT that, in the absence of
 appropriate modelling, a FFL of 3.8mAHD should be provided for.
- DBCA Advising that a number of conditions on the existing PGDP remain relevant to the
 proposal and should apply. However, officers note that a number of these conditions are no
 longer relevant to the development and a full review of the PGDP will be necessary as part of
 a separate process.

Department of Fire and Emergency Services (DFES) – Identified minor anomaly to the Bushfire Management Plan, which can be corrected at subdivision stage.

OFFICER COMMENT

There are a number of concerns with the Structure Plan, as outlined below, that have arisen both during the assessment of the proposal and through submissions received during the public advertising period. The most substantive issues considered in the assessment of the proposal are addressed under the following headings:

- Finished Floor Levels and SPP2.6;
- Local Water Management Strategy;
- Public Open Space;
- Transport Impact Assessment;
- Port Geographe Development Area; and
- Matters arising from submissions.

Finished Floor Levels and SPP2.6

The Stage 1 subdivision was relatively consistent with the existing Port Geographe Development Plan and so was issued subdivision approval ahead of the revised Structure Plan. An agreement was made between the City and developer, given the information available at that time, that finished ground levels (FGL) for Stage 1 would be supported at 2.85mAHD (Australian Height Datum), providing for a finished floor level (FFL) of 2.95mAHD.

The applicant has proposed the development of Area 1 with minimum FFLs of 2.5mAHD. Supporting information submitted with the application (JDA report on 'Interaction of Coastal and Catchment Floods for Determining Port Geographe Finished Floor Levels', provided at Attachment G) considers this height as being sufficient to address storm surge and flooding of the Vasse-Wonnerup Estuary, whilst also reasonably addressing sea level rise.

Advice from DoT draws attention to the fact that the study provided by the applicant in support of the proposal presents 1 in 100 year inundation levels using methods that apply to estuary/riverine flooding only. This approach does not adhere to the SPP 2.6 requirements of investigating 1 in 500 year open ocean flooding for a 100 year planning timeframe.

Extensive discussions have taken place with State Government representatives for DoT, DPLH and DWER, along with the City obtaining its own external expert advice on the matter. The advice provided to the City by the agencies is that SPP2.6 requires a one in 500 year ARI (Average Recurrence Interval) inundation event to be planned for over a 100 year planning time horizon (including an allowance for 0.9 metres of future sea level rise). This could also be described as storm event scenarios that will involve the ocean forces and coastal processes that have at least a 0.2 per cent probability of occurring or one in 500 chance of an extreme storm event in any given year, plus the projected extent of sea level rise over the 100 year time horizon.

The DoT has published a relevant State-wide report for Western Australian Design Storms (released publicly in January 2018). Busselton is reported with a 500 year ARI water level of 2.9mAHD. The DoT's position is that the water levels provided for in this report are generally conservative and resultantly, the State Government's position is that a FFL within the coastal zone should at least be at this level. Over the required 100 year planning time frame, SPP2.6 directs that sea level rise of 0.9m must be planned for. This requirement will result in a minimum FFL of (as explained above) 2.9m + 0.9m, or 3.8mAHD.

Advice from the State agencies indicates that this FFL of 3.8mAHD will be required under SPP2.6 for the Newport Geographe subdivision. However, more detailed investigations specific to the Port Geographe development may provide a different 500 year ARI inundation water level than what is described above. This would need to be a systematic, well justified, and evidence-based analysis to provide a more precise projection of the 500 year inundation levels to inform assessment under SPP2.6. The City's independent expert advice arrived at the same figure of 3.8mAHD for the 500 year ARI level, while also providing indicative inundation levels for various other scenarios. That advice is provided at Attachment H.

The proponent's unwillingness to meet the 3.8mAHD minimum FFL recommended by relevant State agencies and by independent expert advice provided to the City is understood to be linked to concerns about the costs involved in doing so, as well as practical issues with doing so, given the substantial difference in levels that would exist between new and existing development if such a minimum FFL were required. Whilst the City has not undertaken or reviewed detailed financial analysis, the proponent's concerns seem reasonable. Those kinds of concerns are, however, in and of themselves not sufficient to depart from the advice that has been provided to the City.

Further technical assessment could potentially result in some adjustment to the 3.8mAHD level, but it is considered unlikely any such adjustment would be significant, and nor is it considered likely it would significantly address the proponent's concerns.

In this report, the City does not suggest an alternative minimum FFL. Given the proponent's concerns, the technical advice and the policy framework, the key question is — why and in what circumstances would the WAPC, whose role it is to make sustainable planning decisions on behalf of the Government of Western Australia, acting in the best long-term interests of the people of Western Australia as a whole, consider allowing development to proceed at a lower FFL?

SPP2.6 does, to a degree, provide an answer to this question, and that is through the ability for local governments (and in some cases, proponents) to develop a Coastal Hazard Risk Management and Adaptation Plan (CHRMAP). A CHRMAP may then identify alternative means of protecting the development (and other existing areas, that would be similarly exposed to coastal flooding risks), rather than setting building floor levels at or above 3.8mAHD. For instance, that could conceivably be achieved through a system of seawalls/levies and storm surge barriers.

The City has commenced the process of developing its CHRMAP, but the project is not expected to be complete until at least late 2019. In the absence of a CHRMAP and alternative means of addressing the risk, a question then arises as to how else might the City and the WAPC consider allowing development to proceed at a lower FFL?

Conceptually, there are considered to be three key reasons why the City and WAPC might consider doing so –

- Because they might consider that it is a reasonably likely prospect that an alternative means
 of addressing the risk will indeed emerge;
- Because they might consider the risk in the context of the competing risk that the
 development (i.e. the Port Geographe development area as a whole) does not continue to
 completion in a timely fashion, given that the relatively slow and inconsistent progress of the
 development to date has been problematic already; and
- Because they might consider that the application of SPP2.6 without broader consideration creates investor uncertainty, which may have broader implications.

Reflected in the recommended Schedule of Modifications at Attachment K is the requirement for the applicant to provide a more detailed investigation of the site against SPP2.6, consistent with DoT's advice, as information provided in support of the proposal did not satisfactorily consider the 1 in 500 year open ocean flooding in a 100 year planning timeframe. Whilst the City is not in a position to offer an alternate figure, officers consider that a potentially sound outcome would result in levels higher than 2.5mAHD proposed by the proponent, but lower than the 3.8mAHD as advised by DoT and DPLH.

Local Water Management Strategy

The approval of the LWMS is largely dependent on resolution of the FFL matter. It is anticipated that once an agreed position on the FFL is achieved, the remaining matters can be readily resolved.

Some concern is, however, held for the disposal of stormwater into the canals. While the first 15mm of surface water is intended to be captured and treated before being discharged into the canals, large storm events will not be held on site and rather discharged directly into the canals by overtopping the swales into the outfall pipe network. This would not trigger the requirement for an Artificial Waterbody Management Plan (AWBMP) under the Interim Development Deed as that trigger would *only* be in the case of extensions to the canals.

The Deed does, however, also state that the developer must not cause degradation to the waterway/canals through the development of the property. Consideration must therefore be given to the nutrient levels within the stormwater entering canals and the affect this would have on the canal water quality.

A number of technical issues still exist that need to be resolved via the LWMS, which is required to be endorsed, to the satisfaction of DWER, prior to the approval of the Structure Plan. This is reflected in the recommended Schedule of Modifications.

Public Open Space

Much of the discussion related to POS within the Structure Plan proposal is based on the 2009 edition of LN. DPLH has advised that as LN 2015 has been advertised, it is considered to be 'seriously entertained' and therefore should be given due consideration and weight in assessing proposals. The advice provided states that "an advertised policy is often considered more contemporary and reflects the WAPC's most 'up to date' position on an issue. Also, if the application of the draft policy results in a more appropriate and better planning outcome, which is often the case, then the policy should be applied."

Differences between LN 2009 and LN 2015 include a revision to the POS hierarchy, a more comprehensive requirement to consider function in the design of the POS network and the requirement that all residents be within 300m of a usable POS area. An annotated version of the POS Landscape Masterplan has been provided at Attachment F, identifying the relevant POS areas within the proposal.

Undersupply

Both LN 2009 and draft LN 2015 normally require the minimum provision of 10% of the gross subdivisible area to be provided free of cost by the subdivider for development and use as POS. The structure plan currently proposes 9.8% of the area to be provided as POS, which, according to the proponent, is to be reduced further to 8.5% when Area 2 is included within the Structure Plan in future.

LN 2015 allows for a contribution of less than 10% only in particular circumstances, these being described in the table below with the officer response adjacent.

Liveable Neighbourhoods (2015)	Officer response
Requirement 9.4 (pg 108)	
Residential subdivision within regional urban	See below
areas provide a 10 per cent public open space	
contribution. The WAPC, with the support of local	
government may accept a reduction to a	
minimum of five per cent of the gross subdivisible	
area in the following situations:	
a. smaller country towns with limited growth	Not applicable to Busselton, being one of the
prospects;	fastest growing regions in Western Australia.

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b. public open space responsive to particular climate;	Not applicable to Busselton with its relatively mild climate, enabling use of POS for the majority of the year.
c. where public open space is not used for water management purposes;	If incorporated into the calculation, this would further reduce the POS provision applicable to the structure plan area. Along with POS 2 and 5, a considerable portion of POS 1 accommodates drainage, although this is greater than the 1:5 year event and is classified as unrestricted POS according to LN 2015, it is arguable this still has a water management function and so should be excluded from the calculation.
d. does not include any restricted use public open space;	If incorporated into the calculation, this would further reduce the POS provision applicable to the structure plan area, as 2,555m ² of restricted POS has been included by the proponent.
e. the proponent, with advice from the local government, demonstrates that there is sufficient public open space in the locality;	The proponent justifies the POS shortfall by referencing: • the existing POS and recreation areas surrounding the subject site, such as Geographe Bay, other POS within Port Geographe and various playing fields within Busselton Town Centre; • waterfront access to the Port Geographe marina, providing a range of recreational opportunities; and • the future "significant investment" to be made by the developer to create the Waterfront Activity Node. Within the adjacent existing subdivision (land located between Newport Geographe and Navigation Way), 'sufficient' POS has been provided in that it equates to approximately 10% of the gross subdivisible area for that land, it would not be considered 'sufficient' if the additional land area of Newport Geographe was included. The acknowledgement of the coast and playing fields around Busselton is not considered an acceptable justification for reducing the POS requirement from the 10%. This would otherwise apply to all subdivisions in Busselton and a resultant chronic shortfall of POS throughout the District would follow. The latter two points above reference areas outside the current structure plan proposal and is
	outside the current structure plan proposal and is difficult to use in justification in this regard as the provision of these at this point in time is uncertain.

f. the public open space is designed, developed and located to provide the entire community with access to sport, nature and recreation opportunities; and	Although not providing for sport facilities (officers agreed with the proponents that the provision of consolidated active open space areas for Busselton was more efficient than small isolated playing fields), the proposal identifies a number of areas for passive and active recreational use and attempts to regain a natural feel along drainage lines through landscaping design.
g. the public open space is developed in accordance with a Landscaping/Public Open Space Management Plan approved by the local government.	The structure plan area will be subject to a Landscape Strategy, with landscape plans approved for each area of POS at the subdivision stage.

Officers consider that the proposal does not adequately address the requirements for the minimum POS provision required by Liveable Neighbourhoods. It is recommended that the Schedule of Modifications require the plan be amended to meet the 10% minimum POS requirement. The applicant has advised that they are prepared to modify the Structure Plan to meet these requirements.

Function and design

LN 2015 has revised the POS requirements to improve the useability and distribution of POS to meet the needs of existing and future communities. New requirements have been developed to guide provision of POS based on the function it provides the community (sport, recreation or nature) rather than its size. Although this specific requirement hasn't been addressed as part of the proposal, a critical requirement of POS provision is that it offers multiple use spaces.

The current proposal largely achieves this. However, concern has been raised in the past with respect of narrow POS corridors that should be avoided as they do not provide for useable, practical spaces. In some instances, the width of POS has in fact been significantly reduced since initially providing this advice to the proponent. The proposed Structure Plan appears to place a reliance on linear parks in lieu of providing more useable local parks within the neighbourhoods. Linear parks really only have one use, being as a linkage for pedestrian movement from one area to another, as well as serving aesthetic, in part marketing, objectives. Whilst the pedestrian connectivity through POS areas as proposed is appropriate, the POS areas appear to lack the ability for 'multiple use' and catering for the 'diverse resident demographics'.

Local parks should be designed to accommodate daily recreation opportunities for the local community. It is arguable whether POS 4, 6 and 7 (shown on Attachment F) would achieve this. For example, the "Local Park" identified as POS 4, is unlikely to be of much value to residents given it is relatively isolated and at the junction of two major roads. Past experience indicates a distinct pattern where small pocket parks are underutilised compared with their long-term maintenance costs and that this park will not be actively used by residents. The proponent is confident that this "provides for smaller spaces for passive recreation and reflection with revegetation of the central drainage corridor with narrower paths leading to less formal seating areas and quiet spaces sheltered by trees and natural vegetation".

A requirement of residential properties backing onto POS is that visually permeable fencing should be provided at the property boundary to enable passive surveillance of public spaces. However, due to the south-west to south-east prevailing winds often it is found that those lots facing onto POS on their west or south boundary (of the residential lots) will likely end up with solid fencing to provide a barrier to the outdoor living areas. This has occurred in similar situations in the surrounding area and becomes an unsightly aesthetic at the residential and POS interface. The City previously requested this design be reconsidered but, to date, this has not been forthcoming.

Modifications to the Structure Plan are recommended to resolve these matters, which is provided for within the Schedule of Modifications at Attachment K and illustrated at Attachment L. These recommended modifications would involve widening the northern section of proposed POS area 5 along the north-south alignment. A strip of residential land on the eastern side of this POS should then be removed, with the road abutting the POS on that side. Those next rows of dwellings should face west, with frontages directed towards the POS. This will result in the POS being bordered on two sides by a road, which is supported by LN. Further to this, the western-most strip of R40-R60 land should be relocated to the western boundary of this POS area.

These modifications will increase the size of the POS space to make more land available for 'active recreation', while also locate the area of higher density more appropriately towards the future Waterfront Activity Node.

Community Title POS

The proponent has identified POS 6 & 7 to take the form of communal open space within a grouped housing development, the responsibility of the adjoining landowners. These POS access ways will provide a link between open spaces and the canals, encouraging and promoting use of open spaces. The proponent has advised that these are not proposed to function as local parks with sporting functions.

Whilst the permeability for pedestrians through the development is acknowledged and encouraged, private open space should not be counted towards the 10% POS calculation. LN 2015 does not allow public access ways to be included within the POS calculations as less than 15 metres wide is considered to be a pedestrian access way and not credited as POS (page 93 and 95). The proponent has argued that these "linear open spaces", being 7 metres and 10.5 metres in width, are not proposed to function as PAWs as they will be landscaped with nodes for seating.

The proponent further argues that WAPC Development Control Policy 1.3 (DC 1.3) allows for up to 50% of the overall POS contribution to be met through communal open space within a strata development.

"3.3.3 Consistent with legislation, policy and practice in respect of conventional subdivision, for a proposal involving more than a small number of lots, the WAPC may require a contribution towards the provision of public facilities, such as open space, school sites and the like. The WAPC may allow a maximum of 50 per cent of the total 10 per cent public open space to be provided as communal open space within the survey strata subdivision subject to the open space being useable and developed for general recreation purposes..." [Emphasis added]

However, this has been taken out of context. DC 1.3, relating to Strata Titles, does not refer to 50% of the subdivisional area within a Structure Plan, this is referring to the 10% POS requirement for the survey strata plan.

A further requirement of LN is that POS must be vested in the Crown as a Reserve, therefore private open space cannot be considered as Public Open Space. Based on recent history within the District, if private open space is under control of adjacent landowners, it is unlikely those same residents will want public access through the area for security concerns and antisocial behaviour, etc. Ultimately the access way will likely end up gated, thus restricting public access anyway.

Excluding these two areas (POS 6 and 7) further reduces the POS contribution from 9.8% to 9.2%.

Further discussions with the applicant following advertising has resulted in an agreement to remove this land from the POS calculation. It is therefore recommended that the Schedule of Modifications require the Structure Plan be amended to remove this land from the POS calculation.

Transport Impact Assessment

The final version of the draft TIA is yet to be agreed between the City and the developer, with the remaining outstanding matters relating to:

- 1. Intersection treatments on Layman Road The two main entry roads for the development will access off Layman Road (shown on Attachment I as the red 'Access Street A'). The City has advised that roundabouts should be provided at the intersection of these two internal roads and Layman Road, to provide for efficient and safe access and egress at those intersections and act as traffic calming devices along Layman Road. It has been agreed between the applicant and City officers that this matter can be considered closer to the time of subdivision of that area, for which a recommendation is included to require a modification to the Structure Plan to ensure this is captured within Part 1 of the Structure Plan report.
- 2. Service road off Layman Road City officers do not support the location of the service road connecting into Layman Road between the two main access roads into the development (also shown on Attachment I as the green dashed line alongside Layman Road). This has the potential to create conflict with traffic utilising those intersections and generally on Layman Road and should be removed. This impact is exacerbated without the provision of roundabouts at the intersections. This position is reflected in the Schedule of Modifications.
- 3. On street parking adjacent to all POS The developer has advised that the provision of on-street parking adjacent to POS will be considered at the subdivision stage. However, City officers believe that showing this detail at the Structure Plan stage will ensure they can be accommodated within the proposed road reserves. This provision of parking near POS areas reflects the requirements of LN and is recommended within the Schedule of Modifications.

As with POS, the edition of LN applied becomes significant, as the draft 2015 version requires wider street reserve widths than what was acceptable under the 2009 version. As already noted, the WAPC will be referencing LN 2015 and the proponent has been so advised. In a revision to the TIA submitted in support of the proposal, the proponent has recommended that the likely road cross sections can be accommodated within the proposed road reserves and that the LN 2015 widths would be "unnecessarily wide and inconsistent with the adjacent areas and existing roads that will connect to the structure plan area". The TIA further notes that the developer will liaise with the WAPC at the subdivision stage to establish the appropriate road reserve widths and applicability of LN 2009 or 2015. While this detail should ideally be identified up front on the Structure Plan, officers agree that this is a matter that can be determined at subdivision.

Proposals in relation to the pedestrian and cyclist network that are supported by the City include the provision of at least one footpath along all roads except for laneways, along with a 2 metre wide footpath constructed along the length of Layman Road, which will complete the link between Navigation Way, to the west of the site, and Gunwale Elbow, to the east. Footpaths within 400 metres of the waterfront activity node will be a minimum 2.5m wide as required by LN. The developer will also construct a short section of footpath along Armitage Drive between Navigation Way and Jabiru Place to close a gap in the path along this road.

Port Geographe Development Area

Much of the requirements of the PGDA relate to canal lots and the Port Geographe Village Centre. However, of those clauses that remain relevant to the proposal currently under consideration (as referred to within the Statutory Environment section of this report) the proposed Structure Plan is considered to adequately address the provisions of the Scheme at clause 5.9.

The Scheme, at clause 5.9.3(b)(i), requires POS to be developed in accordance with the Port Geographe Development Plan endorsed at the Gazettal date of the Scheme. The District Playing Fields originally identified on the Port Geographe Development Plan are considered to be no longer necessary. The 'rectangular' ovals are of limited size and value to the City in terms of meeting community infrastructure needs and it has been determined that consolidating active open space areas within the District would be more appropriate.

The provision of high level public access to the canals, as required by clause 5.9.3(b)(ii), is not applicable in this instance as no canals are proposed within the submitted Structure Plan area.

A full review of the Port Geographe Development Plan and the provisions of the Port Geographe Development Area within the Scheme is anticipated to be undertaken following determination of the Structure Plan currently under consideration. This review will evaluate subdivision and development requirements in terms of relevance to the area, in particular environmental considerations, and who is responsible for those requirements. As part of this process the Port Geographe Development Plan will need to be brought into full compliance with the Regulations, including the now standard Structure Plan report layout. It is also critical that 'planning closure' is made on the canals, although this may not be possible until such time as the developer submits a proposal on 'Area 2' of Lot 9002.

Matters arising from submissions

The main areas of concern raised during the public consultation process can be addressed under the following headings:

- 1. Change from the original Port Geographe Development Plan indicating a series of canals and man-made lake.
- 2. Increase in residential densities.
- 3. Transport network.

Change from the original Port Geographe Development Plan indicating a series of canals and manmade lake.

The frustration raised by a number of the submissions with regard to the changes from the original plan is understandable. Purchasing property is a big decision and it is commendable that landowners have conducted their own research prior to undertaking such a large investment. Unfortunately the realities of the situation are that the economics or practicalities of the developer continuing with the original development plans, now well over 20 years old, means that review and change need to be considered. Maintaining the water quality of further canals has proven to be problematic and quite simply, is not something that the local government or state government is able to enforce upon the developer. The alternative proposed network of interconnected POS, once developed and suitably modified as per the Schedule of Modifications, would be much more useable by the general public.

Increase in residential densities

A number of submissions objected to the increase in densities relative to those originally proposed, for reasons of amenity (noise and overlooking), increased traffic and building height.

Liveable Neighbourhoods identifies the importance of diversity in the provision of lot sizes and housing stock distributed throughout communities. This assists housing affordability and choice, allowing for products ranging from lots for single dwellings to lots suitable for grouped and multiple dwellings. Higher densities are expected in locations closer to local centres and areas of high amenity such as POS and waterfront areas. An increase of density will also provide for activation and improve viability of surrounding businesses, while adding to the vitality of the neighbourhood.

The final densities that are applied will be driven to a degree by market considerations at the time of subdivision.

The matter of building height was raised by a number of submissions. This seemed to be primarily due to the provision of information provided within Part 2 of the Structure Plan report. Concept illustrations at section 3.7 indicate a number of buildings four storeys or higher around the future proposed Waterfront Activity Node. Also, the text description for the "high density/apartments" at section 3.2 references "views to the Port Geographe Marina and beyond". The Structure Plan does not seek to increase height controls that currently exist under the Scheme, which places a control of 12 metres or three storeys in height within the area. Clause 5.9.2(o) of the Scheme further limits buildings on lots adjacent to Layman Road to 7.5m above the finished surface level of the lot, in order to restrict the amount of light spill into the wetlands. Reference within the document to views of the Marina is unusual, as it is unlikely views will be possible given the presence of dwellings (with many being two storeys) along Burgee Cove, Lanyard Boulevard and Keel Retreat.

Transport network

One of the more significant issues that was raised through the public submissions was the perceived impact of increased traffic along the Ostia Way and Waterline View route from Navigation Way.

A key theme throughout LN is for the provision of neighbourhoods with "highly interconnected movement network" providing route choice for vehicles, pedestrians and cyclists. As mentioned above, increasing the permeability of a neighbourhood reduces the cumulative impact of vehicles on a single route. One important consideration is that the level of traffic on any given road will be greater if there are less alternative routes.

The connection of new urban areas to existing, or proposed urban areas ensures permeability not only for the new residents, but also existing residents in the older neighbourhoods.

Straight street alignments are considered to be more ideal for users and provides more efficient use of land, although can lead to concerns for excessive speeds if not appropriately designed. The combination of short streets along the Ostia Way and Waterline View alignment encourages lower speeds, therefore become effective traffic calming devices (through staggered T intersections, roundabouts). Also, the frequent corners may be a frustration for some users and many are therefore likely to take straighter, more direct routes.

It is important to consider whether the existing street network, being Ostia Way through to Waterline View, is of sufficient width to allow for the necessary road pavement to cater for the projected traffic. For instance, the Ostia Way road reserve is 20m wide between Navigation Way and Mussel Court. This reduces to a width of 18m near the intersection with Headstay Cove. Waterline View on the other hand is 15m wide, but there is potential to increase this width if necessary as the Structure Plan area directly abuts this section of road.

The TIA, submitted in support of the Structure Plan proposal, advised that the existing external transport network is adequate to accommodate the structure plan generated traffic. Further, that traffic generated from outside the structure plan area has been excluded from the assessment given that only a small amount of 'non-structure plan traffic' are likely to travel through the site, for example those coming from the north of Navigation Way heading eastbound or external traffic wishing to access the waterfront area. The TIA expects that motorists would more likely utilise the higher order routes along Layman Road and Navigation Way rather than through the site.

Officers believe that this assumption should be backed up by further technical review, which would then inform whether the Waterline View road reserve width would require widening to accommodate any additional work that might be necessary as a result of subdivision. Provision for this is provided within the Schedule of Modifications.

CONCLUSION

As a result of the assessment detailed above, City officers recommend that the Council provides a recommendation to the WA Planning Commission to support the proposed Structure Plan subject to the prior to gazettal of Amendment 28 and the following modifications (as detailed in the Schedule of Modifications provided at Attachment K):

- 1. That the Structure Plan be modified to identify an appropriate finished floor level that meets the requirements of *State Planning Policy 2.6: State Coastal Planning Policy* (SPP2.6).
- 2. Revision of the *Local Water Management Strategy* to the satisfaction of the Department of Water and Environmental Regulation and the City of Busselton.
- 3. Modify the Structure Plan to ensure that the minimum 10% Public Open Space requirement of Liveable Neighbourhoods 2015 is met.
- 4. Modify the Structure Plan map as set out in the attached plan at Attachment L (which involve shifting the location of some of the proposed medium density areas and redesigning / reorienting some roads and POS).
- 5. Modify the Structure Plan report such that the Public Open Space areas '6' and '7' are removed from the Public Open Space calculation, in accordance with the requirements of *Liveable Neighbourhoods*.
- 6. Modify the Structure Plan at Part 1, section 4 to insert the requirement that prior to the subdivision approval for the applicable stage, consideration be given for the development of roundabouts at the intersections with Layman Road.
- 7. Modify the *Transport Impact Assessment* at Appendix G of the Structure Plan report to remove the Service Road connecting with Layman Road between the two main access roads into the development.
- 8. Modify the Structure Plan and the *Transport Impact Assessment* at Appendix G of the Structure Plan report to provide for on-street parking adjacent to Public Open Space areas, in accordance with *Liveable Neighbourhoods*.

Modify the *Transport Impact Assessment* at Appendix G of the Structure Plan report to include a detailed review of traffic generated externally to the Structure Plan area that may utilise the 'Ostia Way to Waterline View' route.

OPTIONS

Should the Officer Recommendation not be supported, the following options could be considered –

- 1. Resolve to adopt the draft Structure Plan for final approval subject to further (or alternative) modification(s); and/or
- 2. Resolve not to adopt the draft Structure Plan for final approval for reasons to be specified.

TIMELINE FOR IMPLEMENTATION OF OFFICER RECOMMENDATION

Implementation of the Officer Recommendation will occur within two weeks of the date of decision.

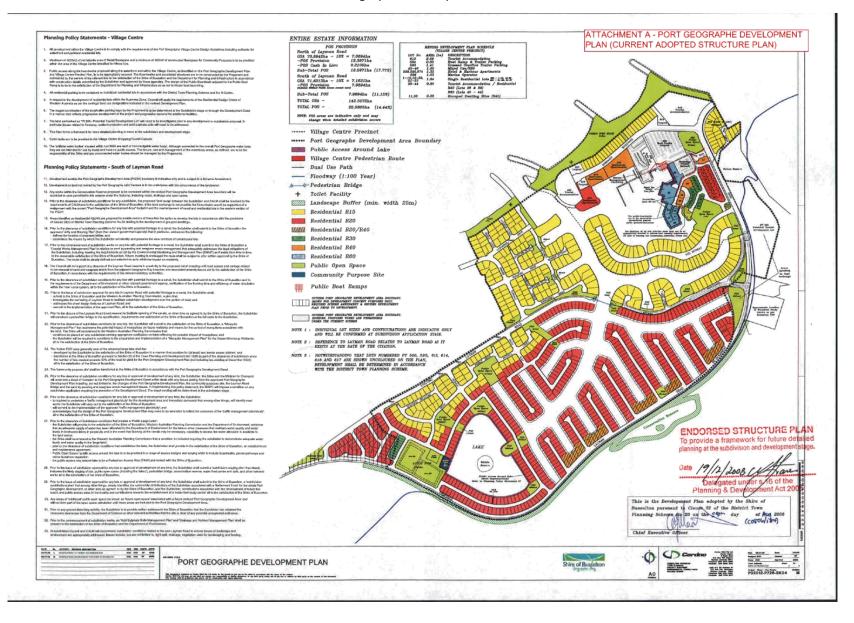
OFFICER RECOMMENDATION

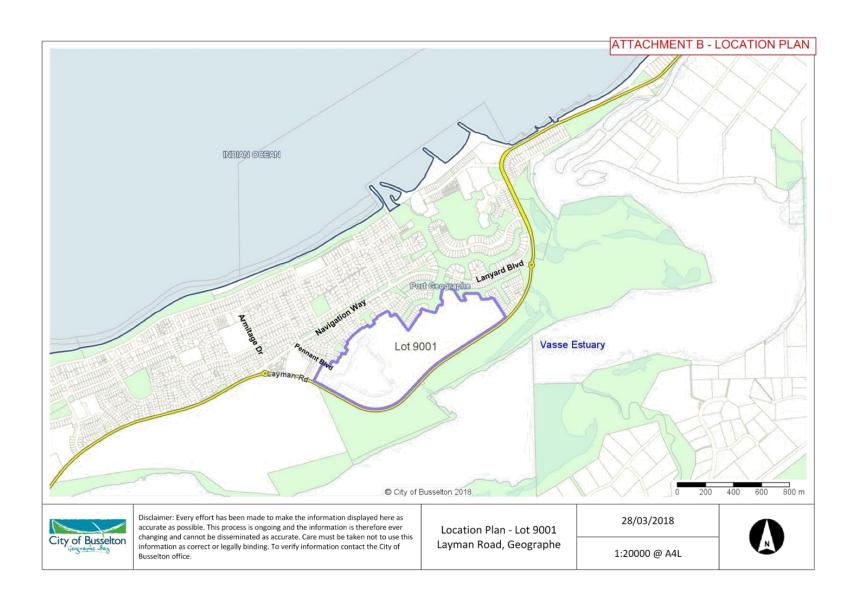
1. That the Council:

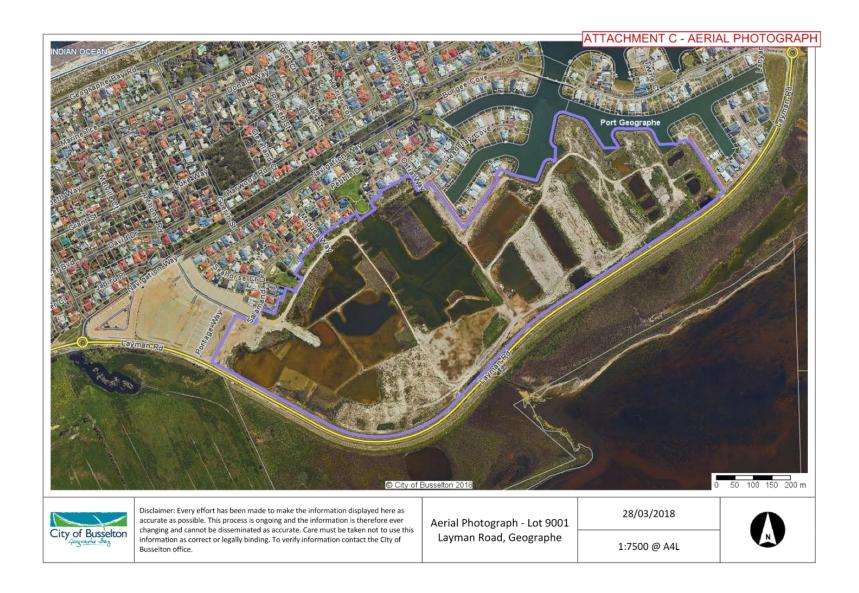
- a. Pursuant to Schedule 2, Part 4 of the *Planning and Development (Local Planning Schemes) Regulations 2015*, adopts the draft Structure Plan for Lot 9002 Layman Road, Geographe for Final Approval subject to the changes included in the Schedule of Modifications at Attachment K and associated sketch at Amendment L of this report.
- b. Pursuant to Schedule 2, regulation 19 of the *Planning and Development (Local Planning Schemes) Regulations 2015*, resolves to endorse the Schedule of Submissions at Attachment J prepared in response to the public consultation undertaken in relation to this draft Structure Plan.
- c. Pursuant to Schedule 2, regulation 20 of the *Planning and Development (Local Planning Schemes) Regulations 2015* requires that a report on the draft Structure Plan be provided to the Western Australian Planning Commission within the timeframe agreed with the Commission.
- 2. Pursuant to Schedule 2, regulations 22 and 23 of the Planning and Development (Local Planning Schemes) Regulations 2015, should the WAPC require modifications be made to the draft Structure Plan, these modifications are to be undertaken accordingly, under Delegated Authority PDR1, unless they are considered by officers to be significantly affect the purpose and intent of the draft Structure Plan, in which case the matter shall be formally referred by to the Council for assessment and determination.

Port Geographe Development Plan

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LEGEND LOCAL SCHEME LOCAL SCHEME RESERVES



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Attachment E











Aigle Royal Developments

Interaction of Coastal and Catchment Floods for Determining Port Geographe Finished Floor Levels

October 2017



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J6322: Port Geographe: Interaction of Coastal and Catchment Floods

DISCLAIMER

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JDA does not take responsibility for checking any landscape and engineering plans attached to this report for accuracy or consistency with this report.

QUALITY ASSURANCE

The JDA quality control system has been in place since 1997 and meets the requirements of AS/NZS ISO 9001:2008. JDA is committed to maintaining and improving the quality management system.

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JDA Report October 2017 Part A (see Part B at Attachment M)



J6322: Port Geographe: Interaction of Coastal and Catchment Floods

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1. INTRODUCTION

1.1 Background

The Port Geographe Local Structure Plan (LSP) Area 1 (Figure 1), denoted in this report as the 'Study Area', is located within the wider New Port Geographe Development with development of Stage 1 currently underway. Stage 1, LSP1 & LSP2 area are shown on Figure 1. The Study Area is located approximately 700m from the Indian Ocean (Geographe Bay) and less than 100 m from the Vasse Estuary.

The topography of the Study Area is generally less than 0.5 mAHD (Figure 2), with imported sand fill proposed to raise the finished lot level to around a minimum of 2.4 mAHD around the central basin with a minimum finished floor level of 2.5 mAHD.

1.2 DWER Busselton Regional Flood Study Recommended Flood Plain Development Strategies

In September 2017, the Department of Water and Environmental Regulation (DWER) provided JDA current recommended flood plain development strategies for Busselton (pers. comm., Simon Rodgers [DWER], 18 September 2017), see Appendix A.

These differ from the original strategy in WAWA (1987).

Following a flood in August 1997 it was concluded that the Vasse Diversion Drain could not convey the 100 year ARI flows and the floodplain development strategy was reviewed taking into account JDA (1998).

For Vasse-Wonnerup Estuary, Appendix A shows the 100 year ARI flood level of 1.45 mAHD and recommended minimum building floor level of 1.95 mAHD, that is 0.5 m freeboard above the 100 year level assuming full flood fringe development.

1.3 City of Busselton Finished Lot Levels and Finished Floor Levels

City of Busselton Standards in relation to Finished Lot Levels (FLLs) and Finished Floor Levels (FFLs) are described in the following documents:

- Section 6 Property Development Technical Requirements and Guidelines, Earthworks, Drainage and Parking (2013).
- Section 2 Designs and Plans for Roads, Earthworks, Paths and Storm Water Drainage (2017);
 and

•

There appear to be discrepancies between the two documents, in that only Section 12 includes consideration of storm surge.

- Section 6, dated June 2013, states criteria for determining both the minimum finished lot level (FLL) and the minimum finished floor level (FFL) for proposed development in the City of Busselton as:
 - FFLs should generally be 500 mm above the 100 year ARI (1% AEP) flood level, with 500 mm denoted as a "desirable freeboard" (City of Busselton, 2013, pg. 2); and

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- 2. FLLs should be a minimum 100 mm above the road centreline or 100 mm above the 100 year ARI (1% AEP) flood path flow or level (City of Busselton, 2013, pg.3).
- · Section 2, dated January 2017, affirms (2) above, however, deviates from (1) above in suggesting:
 - FFLs should be based on the 100 year ARI top storm water level + 500 mm freeboard;
 - Address ocean surge levels (including Tsunamis) plus a 300 mm freeboard (where applicable); or
 - Be otherwise protected from ocean surge.

City of Busselton's Intramaps portal contains FFLs for a range of areas around the City of Busselton, predominantly along coastal areas and adjacent to Estuaries. For Port Geographe, a FFL of 2.5 mAHD is recommended, which differs from DWER recommendation of 1.95 mAHD, see Section 1.2 above.

JDA's interrogation of FFLs on the Intramaps portal has identified the following:

- Wonnerup and lots located on the southern and western boundaries of the Vasse Estuary are
 prescribed FFLs of 1.95 mAHD, equivalent to the 100 year ARI flood level of the Vasse-Wonnerup
 Estuary of 1.45 mAHD + 0.5 m freeboard; as discussed in Chapter 1.2 and shown in Appendix A.
- Lots on the southern and western banks of the New River are prescribed FFLs of 2.28 mAHD –
 equivalent to the 100 year ARI flood level of the New River of 1.58 mAHD assuming no inflow from
 the Vasse Diversion Drain + 0.7 m freeboard (Appendix A).
- Coastal residential lots along Geographe Bay Road are prescribed FFLs of 3.00 mAHD.

JDA notes that a 3.00 mAHD FFL reported in Shore Coastal (2015) is prescribed by the City of Busselton to coastal lots only.

Based on JDA's interrogation of FFLs on the City's Intramaps portal, JDA suggests that the prescribed 2.5 mAHD FFL for Port Geographe allows for both storm surge and flooding of the Vasse-Wonnerup Estuary as prescribed FFLs are above the DWER 1.95 mAHD FFL recommended for areas adjacent to the Vasse-Wonnerup Estuary (Appendix A).

Following publication of a Report by Geoscience Australia on Busselton Coastal Inundation Modelling under Current and Future Climate (Martin *et al.*, 2014) the City of Busselton commissioned reports on coastal flooding and erosion risk (Shore Coastal, 2015, 2017).

These reports collectively represent hydrodynamic modelling and interpretation of extreme sea level and riverine flood combinations without a consistent risk management framework suitable for land use planning.

Engineers Australia has recently published a risk management framework for assessing the joint probability of coastal and riverine (catchment) floods as part of the revision of Australian Rainfall and Runoff.

This framework has not been previously applied to the Busselton area, nor adopted by the City of Busselton.

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1.4 Scope

JDA has been appointed by Aigle Royal Developments to apply the Australian Rainfall and Runoff (ARR) (2016) Chapter "Introduction of Coastal and Catchment Floods" (Westra *et al.*, 2016) method to the proposed Port Geographe Development.

Application of the method is based on the results contained in the following:

- Busselton Regional Flood Study (WAWA, 1987);
- Busselton Regional Flood Study Review Volumes 1 and 2 (JDA, 1998). Prepared for the Waters and Rivers Commission;
- Coastal inundation modelling for Busselton, Western Australia, under current and future climate (Martin et al., 2014). Prepared for Geoscience Australia;
- Busselton Storm Surge Response Plan (Shore Coastal, 2015). Prepared for the City of Busselton;
- Draft report containing flood modelling component of Reconnecting rivers flowing to the Vasse Estuary (DoW, 2016) [Not for distribution];
- Busselton Coastal Management Program, Coastal Flooding Risk, Response and Mitigation (Shore Coastal, 2017). Prepared for the City of Busselton; and
- SPP 2.6 regarding sea level rise.



2. STATE PLANNING POLICY (SPP) 2.6: STATE COASTAL PLANNING

2.1 SPP 2.6 Coastal Planning Policy

SPP 2.6 (WAPC, 2013) provides guidance for decision making within coastal areas and ensures that development takes into account coastal processes and hazards and climate change. SPP 2.6 encourages urban development to be concentrated in and around existing urban settlements.

The policy recommends new infill developments should be located on the least vulnerable portion of the development site and coastal hazard risk management and adaptation measures should be implemented to reduce the coastal hazards risks to an acceptable level.

Allowance for storm surge inundation on coasts, the maximum extent of inundation, should be calculated as the sum of Allowance for the current risk of storm surge inundation (S4) + predicted sea level rise.

2.2 Application of Sea Level Change in Western Australia to Coastal Planning

In relation to SPP 2.65, Sea Level Change in Western Australia, Application to Coastal Planning (Bicknell, 2010) reviews current (to 2009) information on mean sea level variation along the Western Australian coastline including the Fourth Assessment Report of the Intergovernmental Panel on Climate Change (IPCC) (2007) and additional work by CSIRO (2007) of local variations around the Australian Coastline. The Fifth IPCC Assessment Report was published in 2014, with the Sixth Assessment Report due in April 2022.

Bicknell (2010) recommends that as estimates of global CO₂ emissions since 2004 (to 2009) have approximated the fossil fuel intensive A1F1 scenario and there is significant uncertainty in future planning, the A1F1 scenario, representing the 95% percentile, provides the best available precautionary trend for future global emissions.

Bicknell (2010) recommends the A1F1 scenario vertical sea level rise of +0.3 m to 2060 and +0.90 m to 2110 be adopted for assessing the impact of coastal processes over a 100 year planning timeframe. Sea level rise curve to 2110 from Bicknell (2010) is attached as Appendix B.



3. LITERATURE REVIEW

3.1 Busselton Regional Flood Study (WAWA, 1987)

The Busselton Regional Flood Study (WAWA, 1987) assessed the impact of riverine flooding to the Busselton townsite for events of 4% AEP and 1% AEP, i.e. a 25 year and 100 year ARI event, respectively.

Floodgate structures (now denoted as "surge barriers") at the outlet ends of the Vasse and Wonnerup Estuaries control water levels in the estuaries to provide breeding habits for water birds and protect low lying pastures along the eastern Estuary banks from salt contamination.

The Lower Vasse, Sabina and Abba Rivers drain to the Vasse Estuary, with only the Ludlow River draining to the Wonnerup Estuary. During the 4% and 1% AEP events, the Wonnerup Estuary rises quicker than the Vasse, with both becoming a single body of water.

An initial Estuary level of 0.8 m was considered.

Tidal records from 15 June 1983 to 18 June 1983 (72 hours) were used as the expected variation in ocean levels with the high tide of 1.41 mAHD (2.09 mCD). The high tide was modelled to coincide with the peak inflow (243 m³/s for 1% AEP) to the Vasse-Wonnerup Estuary system such that the Estuary acts as a detention system with negligible outflow between 8 hours and 20 hours (Tide Level > Estuary Level).

Modelled Scenarios from WAWA (1987) are tabulated below:

TABLE 1: MODELLED WATER LEVELS FOR THE VASSE-WONNERUP ESTUARY (WAWA, 1987)

Modelled Conditions	Vasse-Wonnerup Peak Flood Level
4% AEP (25 year ARI)	1.25 mAHD
1% AEP (100 year ARI)	1.35 mAHD
- with full development of the flood fringe area	1.45 mAHD
- Outflow through Wonnerup Floodgate only (Vasse Floodgate completely blocked)	1.45 mAHD
Outflow through Vasse Floodgate only (Wonnerup Floodgate completely blocked)	1.50 mAHD

A minimum building FFL of 1.85 mAHD was recommended.

Tidal variations recorded during Cyclone Alby (April 1978) were assessed with the 1% AEP Estuary hydrograph; which resulted in an Estuary flood level of 1.25 mAHD, lower than the 4% AEP (25 year ARI) flood level. Whilst Cyclone Alby recorded a high tide of 1.79 mAHD, the highest on record, it was not sustained for long enough to significantly reduce outflow through the floodgates (i.e. < 12 hours).

The results from WAWA (1987) suggest water level rise in the Vasse-Wonnerup is predominantly due to prolonged closure (> 12 hours) of the Vasse and/or Wonnerup floodgates.

3.2 Busselton Regional Flood Study Review (JDA 1998)

In August 1997, intense rainfall in the upper Vasse River caused the Vasse Diversion Drain (VDD) levee to overtop. This occurred after an upgrade to the drain in 1993 as recommended by the WAWA (1987) study, and the 100 year ARI flow estimate for the VDD was revised from 143 m³/s to 190 m³. JDA was appointed



by the Water and Rivers Commission to review the WAWA (1987) study and recommend a flood management strategy.

The flood management strategy was to ensure that the 100 year ARI flows generated by JDA were similar to the WAWA (1987) flows, such that the building levels recommended subsequent to WAWA (1987) did not significantly under-estimate the level of flood protection required.

Comparison of flood levels from WAWA (1987) and JDA (1998), assuming flood fringe development, is reproduced in Table 2 below:

TABLE 2: ESTIMATED 100 YEAR ARI VASSE-WONNERUP ESTUARY FLOOD LEVELS – WAWA (1987) AND JDA (1998)

	WAWA (1987)		JDA (1998)		
(Years) VDD (prior to 1993 from		Without Inflow from VDD (post 1993 upgrade)	With inflow from VDD	Without Inflow from VDD	
5 (20% AEP)	N/A N/A		N/A	1.15 mAHD	
25 (4 % AEP)	1.25 mAHD	1.25 mAHD	1.30 mAHD	1.29 mAHD	
100 (1% AEP)	1.45 mAHD	1.45 mAHD	1.50 mAHD	1.46 mAHD	

The impact of revised 100 year ARI flows to the Vasse-Wonnerup Estuary was insignificant, and did not impact flood levels recommended in WAWA (1987) for adjacent developments.

JDA (1998) assumed tidal water levels and an initial Estuary level of 0.80 mAHD as per WAWA (1987).

3.3 Coastal Hazard Mapping for Economic Analysis of Climate Change Adaptation in the Peron-Naturaliste Region (Damara, 2012)

Damara (2012) developed inundation hazard mapping for the Peron-Naturaliste Region incorporating:

- Tidal Gauge Datasets for Fremantle, Mandurah, Bunbury and Busselton;
- · Instruments in the Peel-Harvey System; and
- Post-event flood records for the Leschenault, Vasse-Wonnerup and Broadwater Estuaries.

12 inundation zones were distinguished which considered the spatial variability of high water levels and estuarine damping on coastal flooding.

Medium and High Inundation scenarios were determined from extreme distributions fitted to high water level observations. The 100 year ARI (1 % AEP) water level estimate was assumed as the Medium Inundation scenario, and the upper 90% confidence limit of the 500 year ARI (0.5% AEP) was used for the High Inundation scenario. Present-day High Inundation scenarios were noted as comparable by Damara to observed total flood levels during Cyclone Alby. Wave run-up was not included in the analysis due to its effect on inundation declining rapidly inland from the coast.

Inundation Hazard Mapping from Damara (2012) of Geographe Bay is attached as Appendix C. Damara (2012) noted that the reliability of these distributions was recognised as very low due to length of tidal datasets and process uncertainty.

Present-Day Scenarios were modified assuming sea level rises of +0.15 m (to 2030), + 0.47 m (2070) and +0.90 m (2110).



Present Day Inundation Scenarios from Damara (2012) for Geographe Bay have been combined by JDA with associated sea level rises as per Schedule One of SPP 2.6 and are shown in Table 3. Inundation Levels for Port Geographe in Table 3 has been interpolated by JDA as the mid-point between Wonnerup and Busselton.

TABLE 3: INUNDATION LEVELS - PRESENT DAY, 2070 AND 2110. ADAPTED FROM DAMARA (2012)

Location	Medium Inundation (1% AEP) Present Day	Medium Inundation + 0.47 m SLR (2070)	Medium Inundation + 0.90 m SLR (2110)	High Inundation (0.2% AEP; 90% CI) Present Day	High Inundation + 0.47 m SLR (2070)	High Inundation + 0.90 m SLR (2110)
Wonnerup	1.44	1.91	2.34	1.7	2.17	2.6
Port Geographe (Interpolated)	1.42	1.89	2.32	1.67	2.14	2.57
Busselton	1.39	1.86	2.29	1.64	2.11	2.54
Vasse / Broadwater	1.29	1.76	2.19	1.54	2.01	2.44
Quindalup	1.39	1.86	2.29	1.48	1.95	2.38

^{1.} All values mAHD

For Port Geographe, inundation levels have been estimated from Damara (2012) for a 500 year ARI (0.2 % AEP) as 1.67 mAHD (Present Day); 2.14 mAHD (to 2070) and 2.57 mAHD (to 2110).

3.4 Technical Note – Extreme Water Level Analysis, Port Geographe (Worley Parsons, 2013)

The Technical Note was prepared by Worley Parsons in support of the Port Geographe Reconfiguration of Coastal Structures.

The aim of the Technical Note was to:

- 1. Establish and review historical project datums;
- 2. Conduct Extreme Value Analysis (EVA) on the Port Geographe tidal dataset; and
- 3. Review and correlate historical datasets and selected storms.

Tidal Datasets from Port Geographe (2002 - 2012), Bunbury Outer Harbour (1930 - 1974; 2002 - 2005) and Cyclone Alby (Bunbury and Busselton) were assessed, with Port Geographe (2002 - 2012) determined as the most relevant for deriving estimated extreme water levels.

EVA was performed on residuals (differences between measured and predicted water levels) and total water level (WL) using Gumbel, Generalised Extreme Value (GEV) and Weibull distributions.

Water levels from Worley Parsons (2013) have been converted to mAHD from the current Port Geographe Chart Datum (CD) of -0.68 mAHD.

Ocean water level from Gumbel and Weibull are summarised in Table 4 overleaf. GEV failed to provide a reliable fit to residual and total water level analysis.



TABLE 4: OCEAN WATER LEVELS FOR PORT GEOGRAPHE (2002 - 2012) USING GUMBEL AND WEIBULL DISTRIBUTIONS

AEP ARI		Gumbel Distribution		Weibull Distribution	
%	(Years)	Residual WL (m)	Total WL (mAHD)	Residual WL (m)	Total WL (mAHD)
20	5	0.95	1.46	0.90	1.49
10	10	1.04	1.57	1.03	1.58
2	50	1.25	1.80	1.37	1.76
1	100	1.33	1.89	1.53	1.83

The Technical Note suggests EVA was performed on all cyclones that passed within 500 km of Bunbury, however, no supporting information is provided in the technical note in support of this. Instead, the Technical Note suggests a 100 year ARI (1% AEP) water level due to tropical cyclones at Bunbury of 220 cm, with Cyclone Alby estimated to be of the order of a 200 year ARI (0.5% AEP) event for extreme water levels due to tropical cyclones.

Recommended total water level values recommended for design purposes at Port Geographe are shown in Table 5.

TABLE 5: RECOMMENDED TOTAL WATER LEVEL EXTREME VALUES (WORLEY PARSONS, 2013)

AEP (%)	ARI (Years)	Total Water Level (mAHD)
20	5	1.52
10	10	1.62
2	50	1.72
1	100	1.82

3.5 Coastal Inundation Modelling for Busselton, Western Australia, under current and future climate (Martin *et al.*, 2014)

The Geoscience Australia study (Martin et al 2014) modelled coastal inundation by combining storm tide and riverine flood scenarios with current climate and projected future climate with sea level rise. The storm-tide modelling method is similar to Bunbury storm-tide modelling (Fountain *et al.*, 2010), except without the inclusion of the storm gate function.

A base case of Cyclone Alby (B0), Figures 4 and 5, was used to validate the inundation model with scenarios thereafter considering Cyclone Alby – Worst Case whereby storm tracking and timing from the April 1978 cyclone were adjusted to direct maximum winds over Busselton with a coincident Spring tide.

Elevation data considered "bare earth", and did not include buildings or other structures. This has the potential to impact visual interpretation of inundation mapping, in particular around Port Geographe, as "bare earth" elevation data capturing the base of the canals at -5 to -3 mAHD (Pattiaratchi and Wijeratne, 2011)



Scenarios modelled are summarised in Table 6 below:

TABLE 6: BUSSELTON COASTAL INUNDATION MODELLING SCENARIOS (ADAPTED FROM MARTIN *ET AL.*, 2014)

ID	Туре	Sea Level	ARI ¹ Years	Riverine Flood	Figure N°
В0	Base Case (Validation against TC Alby)	Current	200	None	5
B1	Worst Case (TC Alby, track and time shift)	Current	2000	None	6
B2	Worst Case + Sea-Level Rise (SLR)	+ 0.4 m	2000 + SLR 0.4m	None	
В3	Worst Case + SLR	+ 0.9 m	2000	None	
	Troist sads + SETT	0.0 111	+ SLR 0.9m		
B4	Worst Case + SLR	+ 1.1 m	2000	None	
	.,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,		+ SLR 1.1m		
B5	Worst Case + Coincident Flooding	Current	>2000	25 year ARI	7
				(4% AEP)	
B6	Worst Case + Coincident Flooding	Current	>2000	100 year ARI	8
				(1% AEP)	
B7	Worst Case + Coincident Flooding + SLR	+ 0.9 m	>2000	25 year ARI	
			+ SLR 0.9m	(4% AEP)	
B8	Worst Case + Coincident Flooding + SLR	+ 0.4 m	>2000	100 year ARI	
			+ SLR 0.4m	(1% AEP)	
B9	Worst Case + Coincident Flooding + SLR	+ 0.9 m	>2000	100 year ARI	
			+ SLR 0.9m	(1% AEP)	
B10	Worst Case + Coincident Flooding + SLR	+ 1.1 m	>2000	100 year ARI	
			+ SLR 1.1m	(1% AEP)	

^{1.} Sea Level ARI column added by JDA from Martin et al (2014).

The report suggests the return period for Cyclone Alby (B0) is of the order of a 200 year ARI; derived from Hubbert *et al.* (2012) and discussed in Fountain *et al.* (2010).

Reporting in Fountain *et al.* (2010) with respect to Bunbury indicates return period estimation is problematic due to the small number of cyclonic events to have majorly impacted the south-west WA coast; given as 13 across the period 1950 to 2008. Return period was estimated in Fountain *et al.* (2010) by analysis of minimum pressures recorded against a probability density plot to generate the estimated ARI of 200 years for Cyclone Alby.

Fountain et al (2010) Appendix A "Storm Scenario – Background" discusses in greater detail the return period of TC Alby being "a direct impact on Mandurah (for example) as being much higher" and states "the return period for direct impact storm maximum winds passing directly over locations in this region is likely to be an order of magnitude greater. JDA interprets this to mean that the return period of Cyclone Alby directly affecting any locality is of the order of 2,000 years rather than 200. Martin et al. (2014) interprets this in the order of 2,000 to 10,000 years.

The report considers also coincident riverine and storm surge flood for Bunbury and notes that cyclones (like Cyclone Alby) that maintain significant intensity as they move southwards and potentially affect the lower half of the South West Coast would typically be expected to interact with a cold front and evolve into an intense, fast moving system known as extra-tropical transition. As they accelerate, the structure of the cyclone changes so the regions of dense cloud and heavy rainfall are displaced towards the right quadrants



of the system, looking along the direction of the track, leaving the left quadrants likely free of significant cloud.

As a result for a cyclone crossing over a coastal location the heaviest rainfall is expected to occur to the south of that location. In contrast, the strongest winds associated with these fast moving systems occur in the left quadrants; that is to the north of the cyclone centre for a coastal crossing cyclone: this area is typically cloud free.

Quoting from Fountain et al (2010):

"As [a] result of this analysis it can be concluded that for storms that cross the coast, the incident of storm surge associated with the strongest on-shore winds, areas of significant rainfall and the location surge is unlikely to be coincident. For storms that remain off the coast and which have the capacity to produce sea level elevation as a result of 'trapped wave' that propagates southwards along the coast, the heaviest rainfall is also expected to remain offshore.

Based on this assessment it is considered that coincidence of the rainfall induced flooding and significant surge is quite unlikely and is therefore not considered from a modelling perspective here."

Martin et al (2014) assesses return periods of greater than 2,000 year ARIs (< 0.05% AEP) and does not provide detail sufficient from which planning decisions can be made as per SPP 2.6 nor consider *Rare* events (2% and 1% AEP),

The base case scenario (B0) is the actual track of cyclone Alby which resulted in a sea level of 1.84 mAHD, Figure 5.

Martin *et al.* (2014) reports inundation depths with respect to bare earth. The bare earth of the Vasse Estuary ranges from - 0.4 mAHD to - 0.1 mAHD. JDA has used a representative Estuary base level of - 0.2 mAHD to convert inundation depths into mAHD.

Other cases, under current sea level conditions, are B1, B5 and B6 which show progressive increases in water level in Vasse Estuary as shown in Table 7 and in Figures 6 to 8, respectively.

TABLE 7: INUNDATION ELEVATIONS, VASSE-WONNERUP ESTUARY (ADAPTED FROM MARTIN ET AL., 2014)

ID	Change from Previous ID	Change in Inundation Depth (m) from B0	Inundation Elevation (mAHD)	
В0	N/A (Base Case)	N/A	0.8	
B1	Re-track of Alby to Worst Case	+ 0.60	1.4	
В5	+ 25 year ARI (4% AEP) Riverine Flooding	+ 1.00	1.8	
В6	+ 100 year ARI (1% AEP) Riverine Flooding	+ 1.20	2.0	

Difference Maps have been produced by JDA from inundation raster information provided by Geoscience Australia as shown in Figures 9 to 12, respectively, and described below:

- Impact of Cyclone Alby (Worst Case) to Cyclone Alby (1978);
- Impact of Coincident 25 year ARI (4% AEP) Riverine Flooding to Cyclone Alby (Worst Case);
- Impact of Coincident 100 year ARI (1% AEP) Riverine Flooding to Cyclone Alby (Worst Case); and



 Impact of 100 year ARI (1% AEP) Riverine Flooding compared to 25 year ARI (4% AEP) Riverine Flooding.

The additional impact from re-tracking and time-shifting Cyclone Alby (Figure 9), shows most of the additional storm surge of 1.8 m (from 1.85 mAHD (Cyclone Alby, 1978) to 3.45 mAHD (Cyclone Alby, Worst Case) is contained within coastal dune areas, initial Port Geographe canal developments and the Vasse surge barrier.

Coincident 25 year ARI and 100 year ARI flows, as shown in Figures 10 to 12, only significantly impacts the Vasse Estuary, with < 0.2 m increases from all lots shown between Geographe Bay and the Vasse Estuary.

ARIs associated with B0, B1, B5 and B6 scenarios, interpreted by JDA from Martin *et al.* (2014), are estimated at 200, 2000, > 2000, > 2000 Year ARI, respectively (0.5%, 0.05%, < 0.005%, < 0.005% AEP, respectively).

The report also made the following assumptions in relation to inflows and outflows from the Vasse-Wonnerup Estuary:

- · The surge barriers at the Vasse and Wonnerup Estuaries are always open;
- The Vasse River is not used to route water from the VDD to the Vasse River (but does overtop into the Vasse River);
- · The Sabina River diversion to the VDD is not used;
- The surge barriers joining the VDD and the Broadwater are not used; and
- The detention basins in the lower part of the Vasse River are not used.

Fountain *et al.* (2010) showed that the Bunbury storm surge gate (when closed) acts to reduce the extent of inundation for neighbouring areas. The same principle may be applicable to areas around the Vasse and Wonnerup Estuary storm surge barriers.

3.6 Busselton Storm Surge Response Plan (Shore Coastal, 2015)

The Shore Coastal report uses current-day coastal inundation modelling from Martin *et. al.* (2014) to assess the impact on critical and non-critical infrastructure in Geographe Bay during minor, moderate and major flooding events.

Shore Coastal (2015) assigned B0 (Cyclone Alby, 1978) and B1 (Cyclone Alby, Worst Case) from Martin *et al.* (2014) as minor and major flooding events, respectively, with associated coastal storm surge levels of 1.8 mAHD and 3.4 mAHD. A mid-level (moderate) flooding scenario was derived by Shore Coastal and assumed as the mid-point between minor (1.8 mAHD) and major (3.4 mAHD) at 2.6 mAHD. Inundation Mapping from Shore Coastal (2015) is attached as Appendix D.

The report notes a number of caveats to the Geoscience Australia report, namely flooding depths are taken from natural surfaces ("bare earth") as at 2008 and quantification of expected flooding of building floor levels could not be accurately determined. This interpretation directly impacts the proposed Port Geographe Study Area with the DEM model showing bare earth elevations of -5 to -3 mAHD associated with the previously designated use of the site as a canal estate.

Using Cadastre provided by the City of Busselton, Shore Coastal has quantified the number of critical and non-critical buildings (by locality) inundated during minor, moderate and major coastal flooding events. The report shows that a significant number of buildings within the Geographe locality, but predominantly in the



existing canal developments in Port Geographe, are flooded in minor, moderate and major events. The report itself has a caveat to this interpretation noting that the canal frontage with elevations of < 2 mAHD are considered as part of the lot boundary and residential floor levels are generally above 2 mAHD and not flooded in minor or moderate events.

Coincident Riverine Flooding, shown as B5 and B6 in Martin et al. (2014), have a largely negligible impact with Shore Coastal noting that the assumed water levels modelled in Scenario B1 are so extreme and widespread that any coincident riverine flooding is masked.

The report developed a conceptual coastal flooding warning system for Geographe Bay; shown on Figure 13 and detailed below:

- Minor Predicted water level of 0.5 m to 1.m above HAT (1.3 mAHD to 1.8 mAHD).
- Moderate Predicted water level of 1.0 m to 1.5 m above HAT (1.8 mAHD to 2.3 mAHD)
- Major Predicted water level greater than 1.5 m above HAT (2.3 mAHD).

3.7 Busselton Coastal Management Program – Beach Monitoring (Year 3) Draft Report (Shore Coastal, 2016)

This draft report to the City of Busselton presents the results of third year of monitoring of the beaches along the Geographe Bay foreshore.

Of note is the meteorological data presented of Port Geographe water levels (2002 to mid-2016).

The 1 year ARI tidal event is approximated as highest astronomical tide (HAT) + 0.5 m, or 1.26 mAHD.

3.8 Reconnecting Rivers Flowing to the Vasse Estuary – Draft report containing flood modelling components (DoW, 2017)

JDA obtained an extract of the flood modelling component in the *Reconnecting Rivers Flowing to the Vasse Estuary* report (currently in development). JDA has received this documentation in a draft format, dated 1 February 2017 and notes that changes may occur prior to formal publication.

JDA notes that long-term hydrological modelling and recommendations were excluded from the draft copy provided to JDA.

The study examines strategies to re-direct some of the water from the Vasse Diversion Drain and Sabina Diversion Drain back into the Vasse Estuary. FFA and RORB to estimate peak flows for the contributing rivers with the MIKE11 model used to assess 18 different drainage modification scenarios. Inflow hydrographs were provided from GHD (2013).

To test the sensitivity of the MIKE11 model to tidal conditions, the three highest sea levels on record since 1975 were used with the 1% AEP flow:

- 1978 Cyclone Alby 1.84 mAHD (Bunbury);
- 2007 Storm surge and high tide of 1.56 mAHD with a second peak of 1.26 mAHD; and
- 2003 Storm surge and high tide of 1.36 mAHD.

A sustained storm surge from 1996 was considered as ocean levels peaked at 1.13 mAHD and remained above 0.7 mAHD.



In the report, VE1, VE2 and VE3 location IDs were used to describe the Vasse Estuary between Port Geographe and the Vasse Surge Barrier, with VE1 located closest to the Study Area.

With an initial estuary level of 0.6 mAHD, the peak water levels modelled were between 1.42 mAHD and 1.44 mAHD, averaged over locations VE1 to VE3, with minimal variation in water levels from the four tidal patterns. Peak water levels between VE1 upstream and VE3 downstream were: 1.46 mAHD (VE1), 1.45 mAHD (VE2) and 1.40 mAHD (VE3).

Table 4-3 from DoW (2016) has been reproduced below and shows that peak water levels are comparable to the most recent JDA (1998) study at all locations.

TABLE 8: COMPARISON OF DOW (2016) PEAK WATER LEVELS WITH PREVIOUS STUDIES

1% AEP Design Flood Level	WAWA (1987) (mAHD)	JDA (1998) (mAHD)	Current [DoW, 2016] (mAHD)
Vasse Estuary	1.35	1.46	1.45
Wonnerup Estuary	1.35	1.46	1.45
Lower Sabina River – DS of Tuart Drive Bridge	4.22	4.255	4.24
Lower Vasse River – Upstream of Causeway Road Bridge	1.58	1.52	1.50

The report analyses 19 hydrological scenarios reflecting modifications to drainage infrastructure in the Vasse Diversion Drain and Sabina Diversion Drain; both upstream of the Vasse Estuary. Two scenarios were directly related to management of the Vasse Estuary; namely:

- Raising of the Vasse and Wonnerup surge barrier check boards at the end of summer to 0.6 mAHD (from 0.4 mAHD) (S08); and
- Removal of the surge barriers (SP12).

Of the 19 scenarios modelled, the peak Vasse Estuary water-level closest to Port Geographe (VE1) ranged from 1.46 to 1.49 mAHD for 17 of the 19 simulations: these being considered acceptable.

However with full connection of the Vasse Diversion Drain to the Lower Vasse River (S05), peak water levels rise to 1.67 mAHD (VE1), and with full connection of the Sabina Diversion Drain to the Lower Sabina River (S11), peak levels rise to 1.53 mAHD (VE1).

Both of these scenarios were deemed as unfeasible due to severe flooding potential in the lower Vasse River (LVR8) for Busselton (SP05) and increased flood levels on the Lower Sabina River (LSR11) and the Vasse Estuary (SP11).

For SP08, an increase of the check boards will only result in an increased flood risk if left in place during the 1% AEP flood event. This is unlikely this would be the case as the boards are removed during winter.

Removal of the surge barriers (SP12) resulted in only a marginal increase in flood levels (3 to 4 cm), however removal would allow more substantial volumes of sea water into the Estuary and with projected sea level rise, the surge barriers were deemed as increasingly important for flood protection. The scenario was therefore deemed unfeasible.

JDA Report October 2017 Part A (see Part B at Attachment M)



J6322: Port Geographe: Interaction of Coastal and Catchment Floods

3.9 Busselton Coastal Management Program – Coastal Flooding Risk, Response and Mitigation (Shore Coastal, 2017)

This report addresses recommendations 12, 15, 16, 17, 20 and 21 of the Busselton Storm Surge Response Plan (Shore Coastal, 2015) including storm surge inundation modelling under moderate flooding scenarios.

Shore Coastal conducted an "extremes" analysis of the 15 highest water level events recorded at Port Geographe (2002 – 2015). These peak water levels accounted for astronomical tide + tidal anomaly. This excluded wave setup and runup which will likely have negligible impact to the inland development proposed at Port Geographe.

The report tabulates a set of design water levels along the Western Australia coastline, with South-West WA designated as Zone 8, for use in preliminary analysis of coastal inundation risk from tropical cyclones. Estimated design water levels are described as conservative.

Extreme levels from non-cyclonic and tropic cyclones in Shore Coastal (2017) for Zone 8 are shown in Table 9 below.

TABLE 9: NON-CYCLONIC AND TROPICAL CYCLONE WATER LEVELS (SHORE COASTAL, 2017)

ARI (years)	10	25	50	100	200	500
Non-Cyclonic Water Level (mAHD)	1.6	1.8	1.9	N/A	N/A	N/A
Preliminary Design Water Level for Tropical Cyclones (mAHD)	1.4	1.7	2.0	2.3	2.5	2.9

The report conducts an initial flood risk evaluation based on the 2.0 mAHD and 2.5 mAHD contours. Existing canal lots in Port Geographe with a 2.3 mAHD lot level were identified as subject to coastal flooding in a 2.5 mAHD water level. The finished floor level of the Port Geographe canal estates was not stated.

Generally, the report focuses on overtopping along the Geographe Bay coast and properties immediately adjacent to Geographe Bay Road.

The report discusses FFLs available online at the City of Busselton's IntraMaps portal in relation to SPP 2.6. Assessments consider lot levels of residential housing, and not the FFL.



4. APPLICATION OF JOINT PROBABILITY APPROACH FROM ARR (2016)

4.1 Description of Approach

In estuarine areas, a Joint Probability Zone exists whereby flooding can occur from either catchment runoff, elevated ocean levels. or both.

The Joint Probability Zone (labelled 3 in Figure 14) can be impacted by rainfall and runoff (labelled 1 and 2) from the estuarine catchment and storm surge and astronomic tide (labelled 4 and 5) from the Ocean.

Figure 15 shows a schematic of the Joint Probability Zone between fluvial and coastal zones. This Figure shows a range of possible flood levels corresponding to a given AEP enclosed in an envelope bounded by cases where flood events and ocean levels are perfectly dependent (upper curve) and independent (lower curve). The approach described is referred to as the "design variable method", a flood estimation approach recommended across Australia including the south-west of WA.

The interaction (or dependence) between extreme catchment rainfall and storm surge can be critical in determining flood risk in coastal areas. The rarity of coincident estuarine and ocean flood risk is determined by a combination of meteorological, catchment scale and oceanographic processes with different timeframes.

Westra *et al.* (2016) in ARR (2016) describes procedures that can be used to estimate design flood levels in the Joint Probability Zone including Flood Frequency Analysis, Design Variable Method and Continuous Simulation

The question as to whether a catchment flood will coincide with an elevated ocean level depends on several timing issues, which are influenced by a combination of meteorological, catchment and oceanographic processes. Previous studies referred to by Westra $et\ al.$ (2016) show that extreme rainfall and storm surge are statistically dependent. The dependence strength between extreme rainfall and storm surge was found to vary as a function of geographical location around Australia, see Figure 19. For the southwest of WA the dependence value (α) varies from 0.95, 0.90, and 0.95 for durations shorter than 12 hours, 12-48 hours and 48-168 hours respectively. Further details on the Joint Probability Zone are contained in Westra $et\ al.$ (2016).

The Design Variable Method is recommended by Westra *et al.* in preference to either flood frequency analysis (which requires long data series at gauging stations) or continuous simulation (which requires running hydrologic and hydraulic models).

This report focuses on application of the method for Port Geographe and specifically, the Vasse-Wonnerup Estuary, using data from previously reviewed literature cited in this report.

The method comprises five steps as follows:

Step 1: Pre-screening Analysis

This pre-screening analysis assists identification of the Joint Probability Zone. For Vasse-Wonnerup it is assumed, based on the previous modelling work cited in this report, that the Joint Probability Method is required.



Step 2: Dependence Parameter Selection

Dependence Parameters for Australian coasts are shown on Figure 16 (from Westra et al., 2016). In general, there is a strong dependence (90% or greater) between coastal and fluvial zones for most of the Australian coast and all durations.

Step 3: Flood Level Modelling

In this step the flood level corresponding to a number of scenarios of rainfall and ocean water level is evaluated to accurately estimate flood levels incorporating dependence. The scenarios include no rainfall and lower bound of the ocean water level cases to represent the lowest possible value of each variable. The scenarios also include cases with exceedance probabilities lower than the smallest AEP of interest. Up to the 1% AEP, for example, flood levels would need to be modelled for rarer events such as the 0.2% AEP and 0.05% AEP ocean level and rainfall events.

Step 4: Estimation of Exceedance Probability of Flood Levels

A software tool has been developed by Westra *et al.* (2016) for this Step and uses the data from Step 3 as input. The software effectively uses the bivariate logistic extreme value model with the dependence parameter from Step 2 to estimate the bivariate probability distribution function corresponding to extreme rainfall and ocean water levels.

Westra et al. (2016) describe how anthropogenic climate change is likely to increase the exceedance probabilities of flooding in estuarine regions owing to a combination of elevated ocean levels arising from increases in both mean sea level and possible changes in storm surges as well as increases in extreme rainfall

Guidance is given elsewhere in ARR (2016) on possible changes to extreme rainfall intensity (Book 1, Chapter 6) and mean sea level. Westra *et al.* (2016) recommend that the dependence parameters should be unchanged for climate scenario modelling.

4.2 Application of Approach to Port Geographe

4.2.1 Vasse-Wonnerup Estuary - Current (2017)

JDA have interpreted extreme water levels from Martin *et al* (2014) and, based on observations of Cyclone Alby noted in Fountain *et al* (2010), no rainfall was assumed in the generation of flood mapping for Cyclone Alby (1978) and Cyclone Alby (Worst Case).

Intermediate water levels in the Vasse Estuary were estimated using JDA's water balance model from JDA (1998). JDA (1998) used a Runge-Kutta reservoir routing technique that incorporated the following:

- · Runoff from adjacent areas;
- · Inflows from watercourses and Rivers to the Estuary; and
- · Outflows through the Vasse Surge Barrier under varying tidal levels.

The JDA (1998) model assumed the following:

- Tidal levels as per WAWA (1987), i.e. 15 to 18 June 1983;
- Discharge function of the Vasse and Wonnerup surge barrier provided by the Waters and Rivers Commission (WRC); and
- Stage-Area function of the Vasse-Wonnerup Estuary provided by WRC and assuming full flood fringe development.





Full development of the flood fringe of the Vasse-Wonnerup System.

JDA (1998) used an initial Estuary level of 0.8 m. JDA has used an initial water level of 0.6 m for this report; consistent with the more recent DoW (2016).

Inflow hydrographs from JDA (1998) assume no break-out from the VDD.

Tidal levels for period 15 to 18 June 1983, which peaked at 1.41 mAHD, were used in modelling of intermediate water levels. With a peak of 1.41 mAHD, JDA has estimated the tidal pattern as a 50% AEP frequency based on EVA from Worley Parsons (2013), Table 5.

The 15 to 18 June tidal pattern is notable for a high sustained tidal peak with levels above HAT (0.76 mAHD) for 18 to 20 hours and coinciding with peak inflow to the Estuary in WAWA (1987) and JDA (1998). The tidal pattern was shifted in the JDA model to match tidal peak levels from Worley Parsons (2013).

JDA considers this a conservative but appropriate estimation method for the Vasse-Wonnerup.

Estimated Flood Levels for Port Geographe under current sea level conditions have been tabulated in Table 10 below with Joint Probability Modelling results shown in Figure 17.

TABLE 10: JOINT PROBABILITY METHOD, DATA INPUT - CURRENT

		Storm Tide (% AEP)								
		Lower Bound	50	20	10	1	0.5	0.05		
River Flow (% AEP)	No Rain	0.60	0.60	0.60	0.60	0.60	0.80	1.40		
	20	0.83	1.11	1.17	1.22	1.23	1.23	1.60		
	4	0.99	1.24	1.31	1.37	1.47	1.54	1.80		
	1	1.16	1.42	1.49	1.55	1.65	1.70	2.00		
	0.5	1.26	1.52	1.59	1.65	1.75	1.80	2.10		

The 1% AEP Water level in the Vasse-Wonnerup Estuary under current sea level conditions and accounting for 90% dependence between Riverine and Tidal Flooding is estimated as 1.45 mAHD (Figure 17); which is approximately equivalent to the 1% AEP Riverine only flood levels reported in WAWA (1987), JDA (1998) and DoW (2016).

4.2.2 Vasse-Wonnerup Estuary - to 2070 (+0.4 m SLR)

JDA has considered an allowance for sea level rise of +0.4 m (to 2070) from Bicknell (2010).

The Vasse-Wonnerup Estuary is listed under the 1990 Ramsar Convention (WRM, 2007) for its significant waterbird population and breeding habitat for the Black Swan and provides significant economic benefits for the region from significant grazing land on the southern banks of the Vasse Estuary.

Although the future operation of the surge barriers is unknown, JDA considers it likely that the operation of the Vasse and Wonnerup surge barriers in the short-term will be maintain at their current level of operation to support the Ramsar Listing for the site whilst maintaining the economic benefits generated from grazing.

The importance of the surge barriers to regulating water levels in the Vasse Estuary has been described in DoW (2016).

With projected sea level rise of 0.4 m to 2070, JDA assumes surge barriers will remain functional in controlling water levels in the Vasse Estuary to support both waterbird breeding habitats and limit inundation and salinity ingress to the low-lying grazing land.

Scenario B2 from Martin *et al.* (2014) modelled Cyclone Alby (Worst Case), peak storm surge level of 3.65 mAHD, with 0.4 m sea level rise. Figure 18 shows (B2 – B1), i.e. the increase in inundation due to a 0.4 m sea level rise for Cyclone Alby – Worst Case (adapted from Martin *et al*, 2014). This shows a general

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increase of 0.3 m to 0.4 m in inundation depth for all areas north of Vasse Estuary and a 1.2 m increase in Estuary inundation depth. Elevated increases in inundation beyond the 0.4 m sea level rise are shown only for the Vasse Estuary, with no indication of potential overland pathways for this significant increase in Estuary water level. JDA considers the modelling shows all additional inflows to the Vasse-Wonnerup Estuary occur via the surge barrier entrances.

The modelling in Martin *et al.* (2014) assumed surge barriers were always open – such that there is a free-flow of sea water between the Estuary and the Indian Ocean.

The storm surge gate function when applied in Fountain *et al.* (2010) for Bunbury showed that the storm surge barriers acted to reduce the extent of inundation of neighbouring areas.

JDA considers inundation mapping in Martin *et al.* (2014) for 0.4 m sea level rise does not accurately represent incremental inundation due to sea level rise due to surge barriers being modelled as continuously open, which may not be realistic. Note that JDA considers negligible rain to have resulted from Cyclone Alby, as noted in Chapter 3.5 with summary from Fountain *et al.* (2010).

JDA estimates increases in peak water levels in the Estuary will match increases in sea level rise of up to 0.4 m to 2070, as occurs in neighbouring areas of Busselton shown in Figure 17 (denoted in pink).

Estimated Flood Levels for Port Geographe under 2070 sea level conditions assuming sea level rise of 0.4 m have been tabulated in Table 10 below with Joint Probability Modelling results shown in Figure 19.

TABLE 11: JOINT PROBABILITY METHOD, DATA INPUT, + 0.4 M (2070)

		Storm Tide (% AEP)								
		Lower Bound	50	20	10	1	0.5	0.05		
River Flow (% AEP)	No Rain	1.00	1.00	1.00	1.00	1.00	1.20	1.80		
	20	1.23	1.51	1.57	1.62	1.63	1.63	2.00		
	4	1.39	1.64	1.71	1.77	1.87	1.94	2.20		
	1	1.56	1.82	1.89	1.95	2.05	2.10	2.40		
	0.5	1.66	1.92	1.99	2.05	2.15	2.20	2.50		

The 1% AEP Water level in the Vasse-Wonnerup Estuary under 2070 sea level conditions and accounting for 90% dependence between Riverine and Tidal Flooding is estimated as 1.85 mAHD (Figure 19);

4.2.3 Vasse-Wonnerup Estuary - to 2110 (+ 0.9 m SLR)

SPP 2.6 and Bicknell (2010) recommend an allowance for sea level rise of +0.9 m to 2110.

Layman Road between the Spinnaker Boulevard and the Wonnerup surge barrier separates the Indian Ocean from the Vasse-Wonnerup Estuary. Both the road reserve and adjacent residential housing are particularly vulnerable to tidal variation and storm surge, especially with projected sea level rise to 2110. The current elevation of Layman Road between Port Geographe and the Vasse Surge Barrier is 2 to 3 mAHD, with the Vasse and Wonnerup surge barriers and low-lying areas near the Ludlow River at approximately 1.6 to 2 mAHD

Scenario B3 from Martin *et al.* (2014) modelled Cyclone Alby (Worst Case), peak surge level of 3.65 mAHD, with 0.9 m sea level rise. Figure 20 shows (B3 – B1), i.e. the increase in inundation due to a 0.9 m sea level rise for Cyclone Alby – Worst Case (adapted from Martin *et al*, 2014). As with Figure 18, there is a threefold general increase in Estuary levels of approximately 2.7 m compared to sea level rise. In general, most areas north of the Vasse Estuary show an increase in inundation equivalent to sea level of 0.9 m. There is some break-out from the Estuary at the Study Area, on-flowing towards the existing Port Geographe canal

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estates. As per Section 4.2.2, modelling in Martin *et al.* (2014) considers free-flow between the Indian Ocean (Geographe Bay) and the Vasse Estuary and likely significantly overestimates peak Estuary levels

In the long-term to 2110, JDA considers there is significant uncertainty in management of the Vasse Estuary due to significant Ocean inflows to the Estuary via low lying coastal areas near the surge barriers and Ludlow River and potential overtopping of Layman Road between the Port Geographe canal estate and Wonnerup in significant storm surge events. To protect residences within close proximity to the Ocean and the surge barrier, additional barrier protection will likely be required in future.

Due to uncertainties associated with possible reconstruction of surge barriers, and their operation, this report does not attempt to estimate future peak Estuary water levels to 2110 associated with the predicted 0.9 m sea level rise.



5. CONCLUSIONS

The proposed Newport Geographe Development is located near Geographe Bay (Indian Ocean) and the Vasse Estuary, with LSP Area 1 denoted as the Study Area. Aigle Royal Developments propose to raise the finished lot level with imported fill to around a minimum of 2.4 mAHD at the centre basin, with FLLs gradually increasing outwards to the Study Area boundaries.

For comparison to current literature for the existing Port Geographe canal estate and the wider Geographe Bay, JDA have estimated a minimum residential floor level of 2.5 mAHD; 0.1 m above the FLL. This equals the current FFL required for Port Geographe of 2.5 mAHD, as stated on City of Busselton's IntraMaps portal.

State Planning Policy (SPP) 2.6 recommends new infill developments should consider coastal hazard risk management and adaption measures to reduce coastal hazards risks to acceptable levels. Based on previous reporting, this report offers a preliminary examination of the impact of both storm surge and flood levels in the Vasse-Wonnerup Estuary, and sea level rise to the proposed minimum FLLs and FFLs for the Study Area. To date, Damara (2012) is the only publication to have considered the potential inundation extent from the 500 year ARI (0.02 % AEP) as stated for consideration in SPP 2.6. For Port Geographe, this translated to inundation levels of 1.67 mAHD (current); 2.14 mAHD (to 2070) and 2.57 mAHD (to 2110); current and 2070 being below the proposed minimum residential floor level of 2.5 mAHD.

Reporting to date has generally separately assessed the impact of cyclonic storm surge and tidal variation or riverine and estuarine flooding to the Busselton locality. Combined estuarine and storm surge in Martin *et al.* (2014) was assessed for extreme events; generally at classifications of "Very Rare" (1,000 to 10,000 Year ARI; Commonwealth of Australia, 2015) and whilst important for emergency risk management, it is not readily applicable to urban planning.

Modelling of peak water levels of around 1.43 to 1.46 mAHD for the Vasse-Wonnerup Estuary in WAWA (1987), JDA (1998) and DoW (2016) has shown vary little variation in peak waters in the Estuary, especially when considering different tidal patterns and hydrographs. Drainage improvements in the early parts of the 20th century including floodgate installations (1908), construction of an ocean outlet from the New River (1915) and construction of the Sabina and Vasse Diversion Drains (1927) has restricted catchment runoff to the Estuary. Given the considerable areal extent of the Vasse and Wonnerup Estuaries, there is sufficient capacity to detain catchment runoff during sustained high tide events (WAWA, 1987) or as was the case during Cyclone Alby (1978) until favourable tidal conditions allow for discharge from the Estuary via the Vasse and Wonnerup surge barriers. In recent memory Cyclone Alby, approximately 40 years ago, has represented the most significant storm surge event.

DoW (2016), released to JDA in a draft format and part of the wider *Reconnecting Rivers* program for the Vasse Estuary, considered a number of potential changes to drainage infrastructure and management in the short-term for the Vasse-Wonnerup System. Full re-diversion of the Sabina Diversion Drain or the Vasse Diversion Drain, from which increases in peak water levels of up 0.2 m were modelled in DoW (2016), was deemed unfeasible due to elevated flood levels elsewhere in the Vasse-Wonnerup System with the other options considered feasible resulting in only modest (3 to 4 cm) increases in peak water levels in the Vasse Estuary.

Shore Coastal (2015, 2016, 2017) has developed a comprehensive Coastal Management Program for the City of Busselton which applies the work conducted in Martin *et al.* (2014) to a succinct management framework for decision making and risk management for the City of Busselton. JDA notes there is some variation in extreme tidal levels, derived from EVA, in Worley Parsons (2013) and Shore Coastal (2017). This is likely due to both a limited data period and very few Rare to Extreme events. JDA has used extreme maximum tidal levels from Worley Parsons (2013) in this report.

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JDA has used the Design Variable Method, as recommended in ARR (2016), to assess the combined impact of tidal floods and estuarine floods to the Study Area.

For current and 2070 sea level conditions, JDA has derived estimate 1% AEP peak water levels of 1.45 mAHD and 1.85 mAHD for the Vasse-Wonnerup Estuary.

Due to uncertainties associated with possible reconstruction of surge barriers, and their operation, this report does not attempt to estimate future peak Estuary water levels to 2110 associated with the predicted 0.9 m sea level rise.



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6. RECOMMENDATIONS

JDA recommends this report be submitted in support of a Structure Plan for Newport Geographe



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7. REFERENCES

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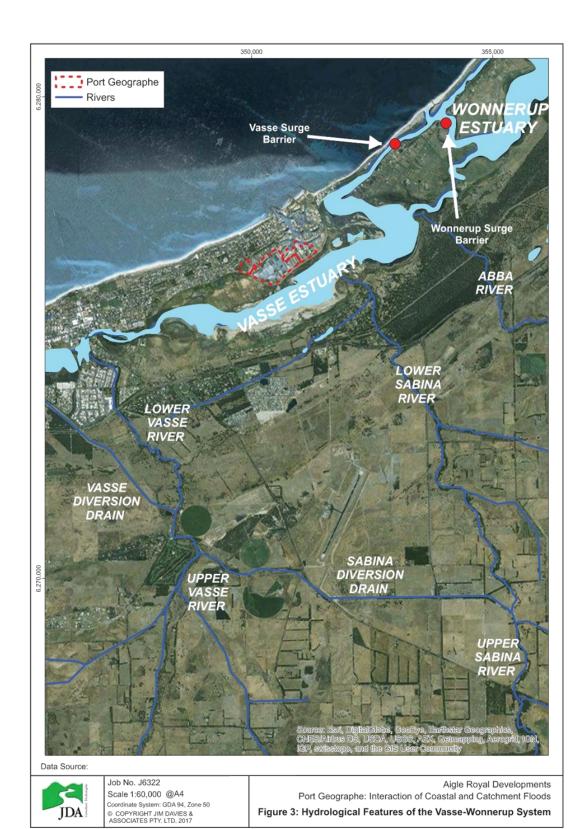
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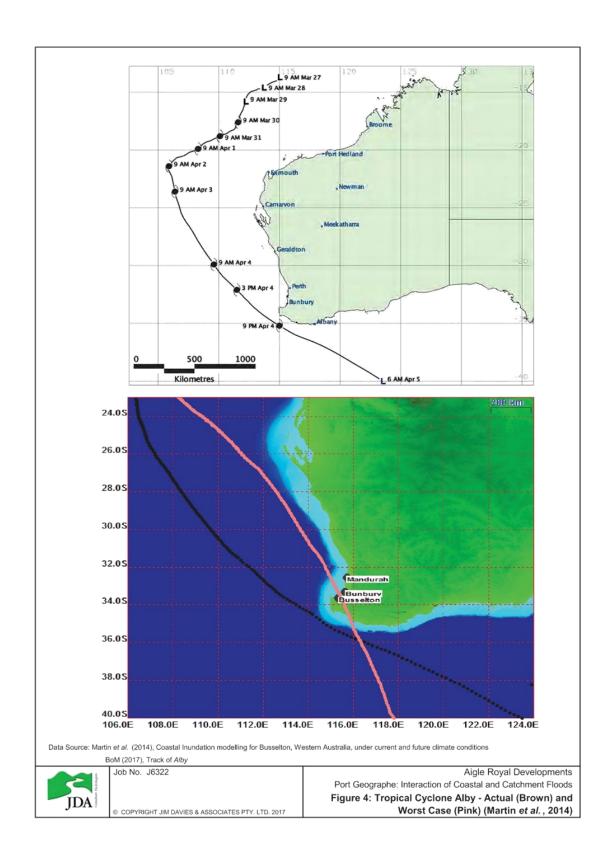
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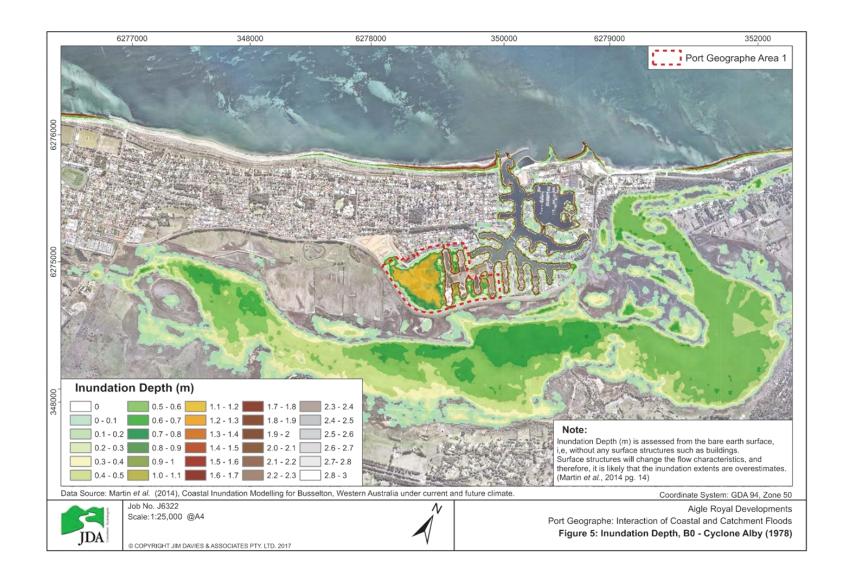
FIGURES

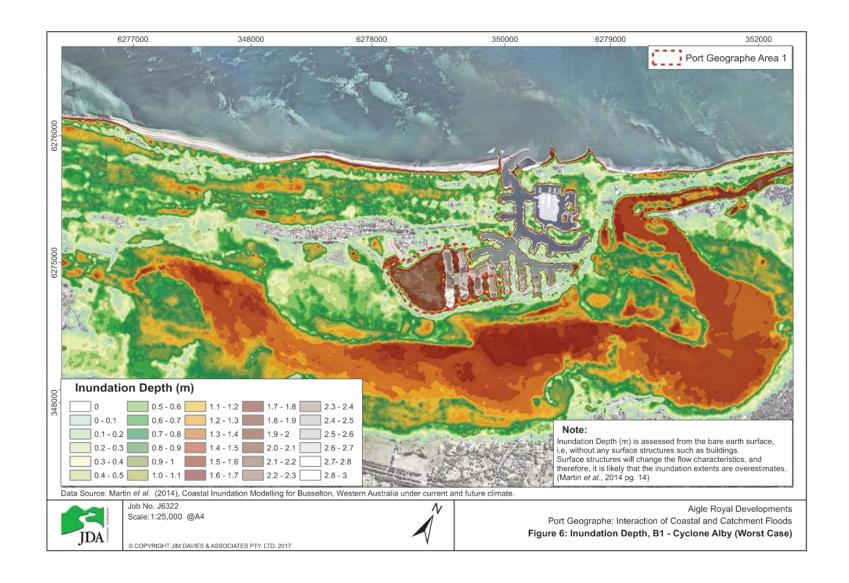


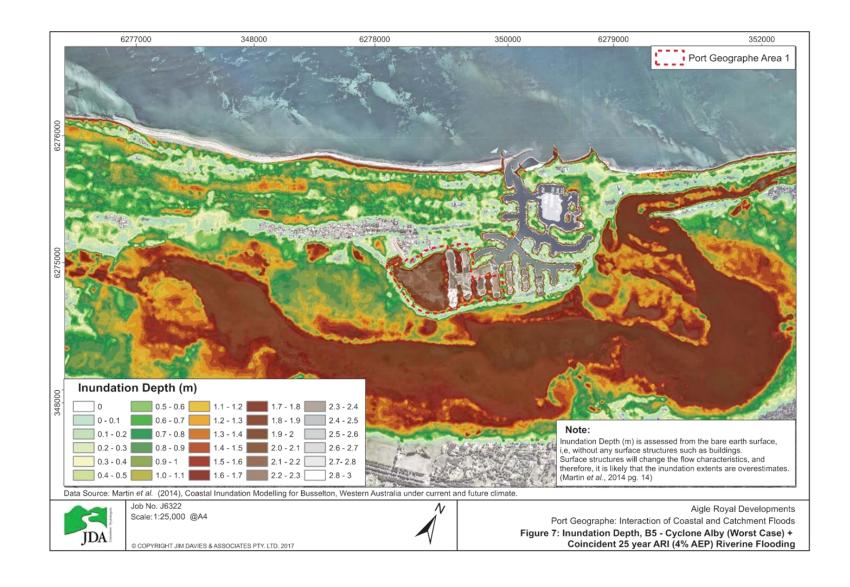


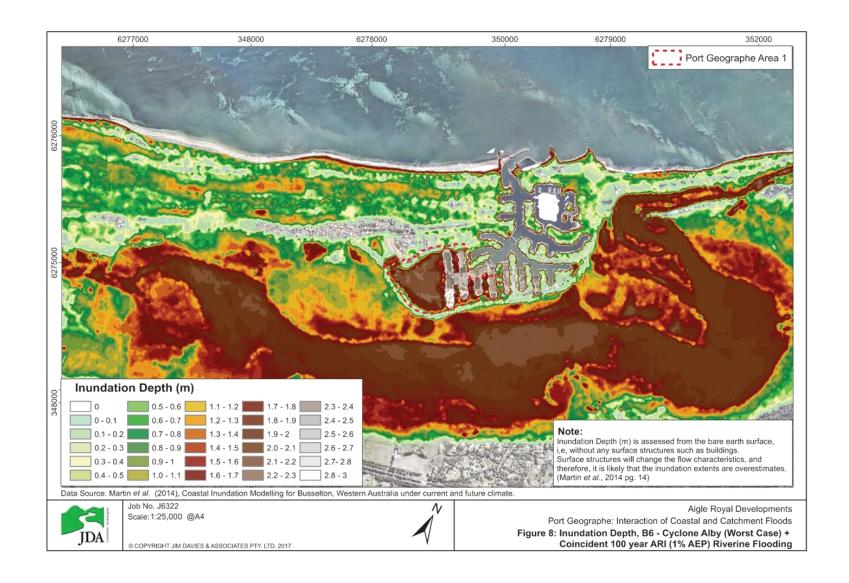


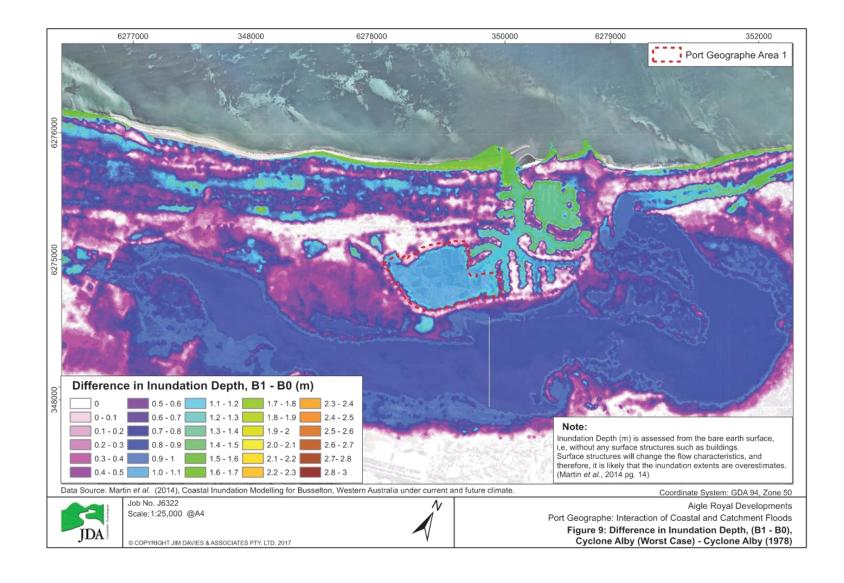


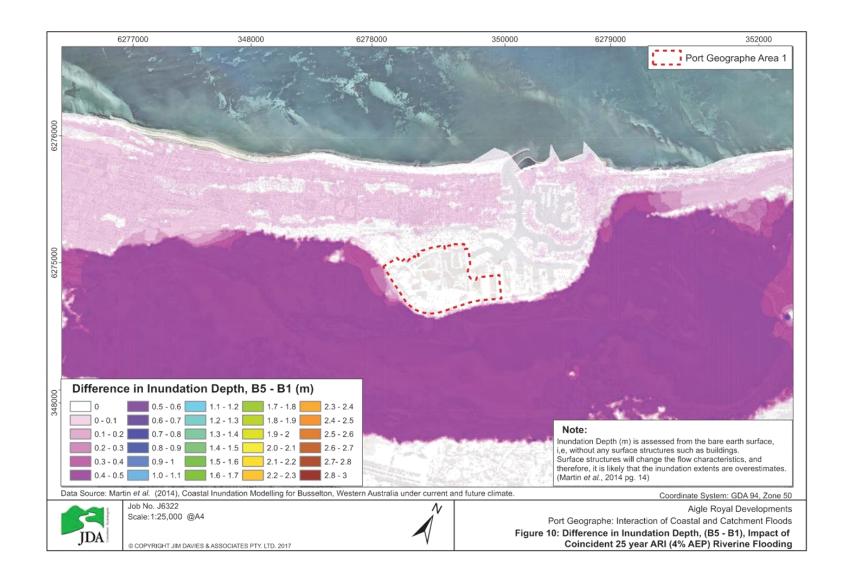


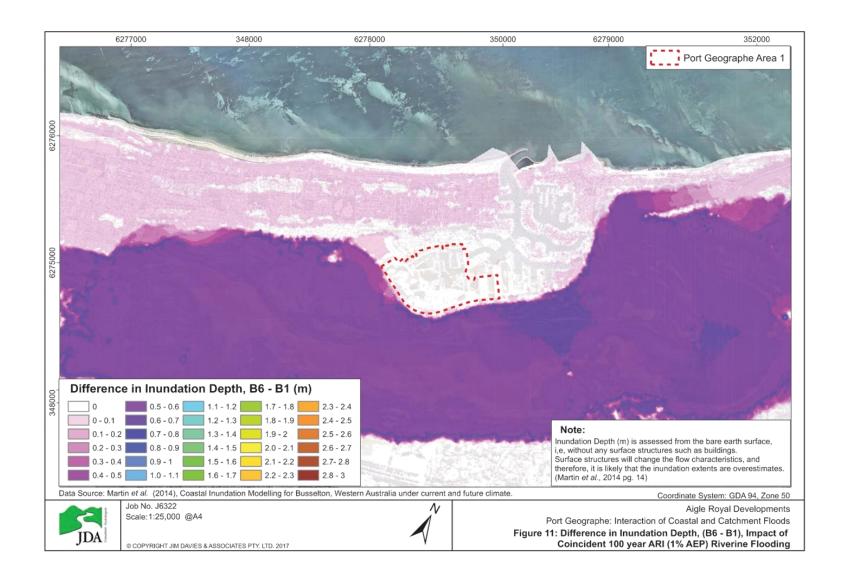


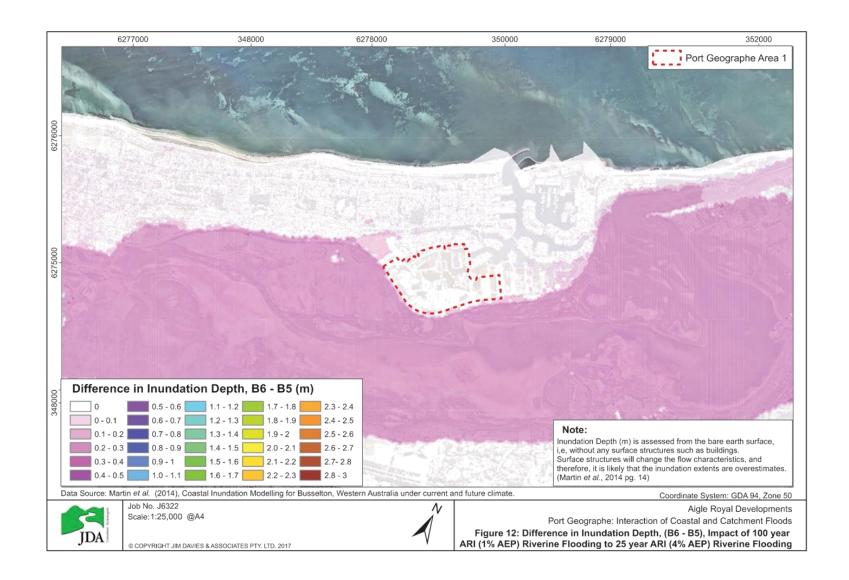












ATTACHMENT H - SHORE COASTAL ADVICE



Port Geographe Aigle Royal Development - Water Level Assessment

	Present Day				30year (Building				50year Planning				100year Plan			
	10yrARI	50yrARI	100yrARI	100yr ARI TC	10yrARI	50yrARi	100yrARi	100yr ARI TC	10yrARi	50yrAR1	100yrARt	100yr ARI TC	10yrARI	50yrARI	100y/ARI	100yr ARI TC
Still water level (mAHD)	1.6	1.9	2.0	2.3	1.6	1.9	2.0	2.3	1.6	1.9	2.0	2.3	1.6	1.9	2.0	2.3
Wave action	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Freeboard (m)	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3
Sea Level Rise Allowance (m)	0.0	0.0	0.0	0.0	0.15	0.15	0.15	0.15	0.3	0.3	0.3	0.3	0.9	0.9	0.9	0.9
FFL (mAHD)	1.9	2.2	2.3	2.6	2.05	2.35	2.45	2.75	2.2	2.5	2.6	2.9	2.8	3.1	3.2	3.5

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Year		S0yrARI WL + SLR + Freeboard (mAHD)	SLR + Freeboard	SLR + Freeboard		Existing Port Geographe FFL (mAHD)
2017	1.9	2.2	2.3	2.6	2.85	2.3
2047	2.1	2.4	2.5	2.75	2.85	2.3
2067	2.2	2.5	2.6	2.9	2.85	2.3
2117	2.0	3.1	3.2	3.5	2.95	2.5

Extent of Submergence (m) - Present Day

			Agile Royal Open		Existing	Progosed
		Canal revetment	Space Drainage	Typical Road Level	Residential	Residential
Existing Water Levels	Level (mAHD)	(1.2mAHD)	(1.6mAHD)	(2.0mAHD)	(2.3mAHD)	(2.85mAHD)
MSL	0	-1.2	-1.6	-2.0	-2.3	-2.5
MHWS	0.4	-0.8	-1.2	-1.6	-1.9	-2.5
HAT	0.8	-0.4	-0.8	-1.2	-1.5	-2.
1yrARI	1.1	-0.1	-0.5	-0.9	-1.2	-1.5
10yrARI	1.6	0.4	0.0	-0.4	-0.7	-1.
50yrAR1	1.9	0.7	0.3	-0.1	-0.4	
100yrARi	2.0	0.8	0.4	0.0	-0.3	-0.9
100yrARi Cyclone	2.3	1.1	0.7	0.3	0.0	-0.9
500yrARI Cyclone	2.9	1.7	1.3	0.9	0.6	

Extent of Submergence (m) - 50yr SLR of 0.3m.

			Agile Royal Open		Existing	Proposed
		Canal revetment	Space Drainage	Typical Road Level	Residential	Residential
Existing Water Levels	Level (mAHD)	(1.2mAHD)	(1.6mAHD)	(2.0mAHD)	(2.3mAHD)	(2.85mAHD)
MSL	0.3	-0.9	-1.3	-1.7	-2.0	-2.
MHWS	0.7	-0.5	-0.9		-1.6	
HAT	1.1	-0.1	-0.5	-0.9	-1.2	-1.
1yrARI	1.4	0.2	-0.2	-0.6	-0.9	-1.
10yrARI	1.9	0.7	0.3	-0.1	-0.4	-1
50yrARI	2.2	1.0	0.6	0.2	-0.1	-0.
100yrARI	2.3	1.1	0.7	0.3	0.0	-0.
100yrARI Cyclone	2.6	1.4	1.0	0.6	0.3	-0.
500yrARi Cyclone	3.2	2.0	1.6	1.2	0.9	0.

Extent of Submergence (m) - 100yr SLR of 0.9m.

			Agile Royal Open		Existing	Proposed
		Canal revetment	Space Drainage	Typical Road Level	Residential	Residential
Existing Water Levels	Level (mAHD)	(1.2mAHD)	(1.6mAHD)	(2.0mAHD)	(2.3mAHD)	(2.85mAHD)
MSL	0.9	-0.3	-0.7	-1.1	-1.4	-2.0
MHWS	1.3	0.1	-0.3	-0.7	-1.0	-1.6
HAT	1.7	0.5	0.1	-0.3	-0.6	-1.2
1yrARI	2	0.8	0.4	0.0	-0.3	-0.9
10yrARI	2.5	1.3	0.9	0.5	0.2	-0.4
50yrAR1	2.8	1.6	1.2	0.8	0.5	-0.4 -0.1
100yrARi	2.9	1.7	1.3	0.9	0.6	0.0
100yrARI Cyclone	3.2		1.6		0.9	0.4
500yrARI Cyclone	3.8	2.6	2.2	1.8	1.5	1.0



- Tritial planes (MSI, Abri4S, MAT) from DoT 2012 in Stone Coastal 2016 (Indirer Table 2.1).
 1. 100/MSP from extremes uniform of That Gree Wall within its Stone Coastal 2016 (right Table 2.3).
 1. 100 500/MSP (Stone Stone) coastan from Oracles Coastans (MSI (Stone) mark) (Foundam 1017) (refer Table 2.4).
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Tal	ble 2.1	ridal Pla	ns for B	usselte	on (Marc	:h 2012)		
Tidal Level	LAT	MLLW	MHLW	AHD	MSL	MLHW	MHHW	HAT
Water Level (mAHD)	-0.68	-0.23	-0.12	0.0	0.13	0.37	0.48	0.76
% Time Submerged	100	90	84	74	62	37	27	8

Average Return Interval (years)	1	10	25	50	100	200	500
Non-Cyclonic High Water Level (mAHD)	1.2	1.6	1.8	1.9	2.0	n/a	n/a

Average Return Interval (years)	10	25	50	100	200	500
,			-			



Attachment I

ATTACHMENT I - RECOMMENDED ROAD HIERARCHY

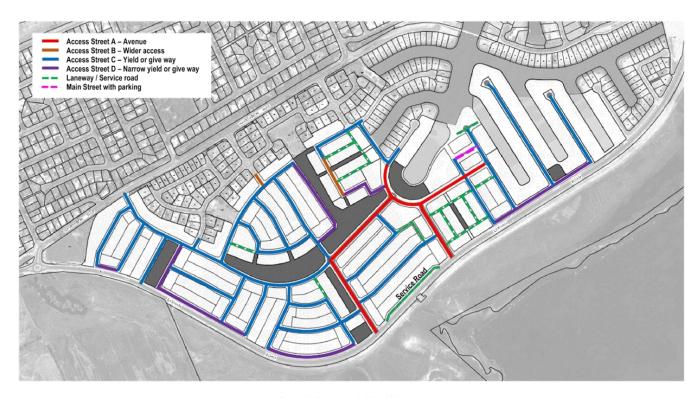


Figure 13: Recommended Road Hierarchy

No	NAME & ADDRESS	NATURE OF SUBMISSION	STAFF COMMENT	STAFF RECOMMENDATION
Agen	cy Submissions			
1.	Telstra Plan Services Locked Bag 3820 Brisbane QLD 4001	Telstra assets are located within the area of the proposal. Plant records indicate the approximate location of the assets, may not to be up to date and should not be relied upon. We suggest contacting Dial Before You Dig for a detailed site plan and engage a Telstra Accredited Plant Locator (APL) to determine the exact location of the asset. Once the precise location of the Telstra assets has been established, the Telstra assets can be relocated or the proposal realigned to ensure they are no longer impacted.	Noted and information provided to the applicant.	That the submission be noted.
2.	ATCO Gas Locked Bag 2 Bibra Lake DC WA 6965	No objection. The content of Section 10 (Gas Supply) of the Structure Plan documentation (Appendix F Engineering Services Report) is consistent with existing gas infrastructure in the adjacent road reserves of Layman Road and Pennant Boulevard, Geographe.	Noted.	That the submission be noted.
3.	Department of Education 151 Royal Street East Perth WA 6004	No objection. The anticipated student yield from this development can be accommodated in the existing Busselton Primary School.	Noted.	That the submission be noted.
4.	Department of Water and Environmental Regulation Planning Advice South West Region PO Box 261 Bunbury WA 6231	Appended to the draft Structure Plan was the 'Port Geographe Development Area 1 Local Water Management Strategy (version 1666AD dated 09/01/18)', for which the Department provided comment to the City on 18/01/18. The department's previous comments are still relevant. A key aspect raised by the department was the need to determine the extent to which State Planning Policy 2.6 (SPP2.6) was to be applied. It is understood that a meeting between the City, the Department of Planning, Lands and Heritage and the Department of Transport was held on 18/06/18. Depending on the agreed level of application of	Comments by DWER were provided to the proponent. The Structure Plan documentation has not been updated to reflect the minimum FFL recommended by the Department of Transport and the Department of Planning, Lands and Heritage. It is understood that the LWMS will require review once the minimum FFL requirement has been determined. Officers agree with DWER's recommendations, with points 2 and 3 having been implemented and	That the submission be noted and the applicant be directed to modify the Local Water Management Strategy to the satisfaction of the City of Busselton and the Department of Water and Environmental Regulation prior to approval of the Structure Plan.

No	NAME & ADDRESS	NATURE OF CURMICCION	STAFF COMMENT	STAFF RECOMMENDATION
No	INAINIE & ADDKESS	NATURE OF SUBMISSION SPP2.6, the finished lot levels may be significantly	the requirement of the LWMS to be reviewed	STAFF RECUIVITIVIENDATION
		impacted. This may have a flow on effect of	following resolution of the minimum FFL	
		impacting on water management and hence a	requirement under SPP2.6.	
		need to revise the LWMS.	requirement under 5FF2.0.	
		The Department therefore recommends that:		
		A resolution is reached regarding the extent		
		to which State Planning Policy 2.6 is to be applied.		
		2. The City reviews the department's previous		
		comments on the LWMS, and if required modify		
		them and/or provide additional comments.		
		3. The City forward comments on the LWMS		
		along with the resolution regarding State Planning		
		Policy 2.6 to the consultant for actioning.		
		4. The LWMS be finalised to the satisfaction of		
		the City and department prior to the draft		
		Structure Plan being approved.		
5.	Department of Transport	Our review is confined to the inundation	This information is consistent with pre-	That the submission is noted,
	(Coastal Infrastructure)	assessment aspect of the Structure Plan Report by	consultation advice received from the	however the Western Australian
	1 Essex Street	Taylor Burrell Barnett (TBB), and Appendix C by	Department of Transport and is discussed within	Planning Commission is respectfully
	Fremantle WA 6160	360 Environmental (360).	the body of the report.	requested to consider the matter
		The subject site borders Vasse-Wonnerup Estuary		holistically and consider that a more
		via Layman Rd to the south, though is also directly	Whilst the City is not in a position to offer an	flexible approach to the assessment
		connected with the open ocean through the Port	alternate view, a sound outcome would result in	of the development against SPP2.6
		Geographe marina entrance to the northeast. This	levels higher than the 2.5m proposed by the	might be available.
		means the DP18/0001 site is vulnerable to	applicant but lower than the 3.8m offered by	The configuration designed to
		inundation by ocean flooding. Resultantly, the State Coastal Planning policy (SPP2.6) applies	State agencies.	The applicant is also required to submit a more detailed assessment
		here.		against SPP2.6, using appropriate
		SPP2.6 requires consideration by the City of		methods as detailed in the DoT
		coastal inundation risk caused by a 1 in 500yr		submission, being the investigation
		tropical cyclone in the Busselton area over a 100yr		of 1 in 500yr open ocean flooding in
		planning timeframe.		a 100yr planning timeframe.
		Appendix C by 360 presents 1 in 100yr inundation		/· F
		levels using methods that apply to		
		estuary/riverine flooding only; this approach does		
		not adhere to the SPP2.6 requirements of		
		investigating 1 in 500yr open ocean flooding in a		
		100yr planning timeframe.		

Council 13.2

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No	NAME & ADDRESS	NATURE OF SUBMISSION	STAFF COMMENT	STAFF RECOMMENDATION
		The TBB Local Structure Plan report and Appendix C did not conduct a detailed open ocean flooding study for the subject site. In the absence of local tropical cyclone flood modelling, the following conservative water levels are recommended based on the broad scale cyclone inundation studies undertaken by Department of Transport (DoT 2016); this study complies with SPP2.6: The ocean inundation level at the subject site for a 1 in 500yr tropical cyclone is + 2.9mAHD for the present day In the required 100-year planning timeframe, +0.9m sea level rise over 100 years need to be considered. Resultantly the ocean inundation level under SPP2.6 in 2119 is +3.8mAHD.		
6.	Water Corporation Development Services	The subdivision and development of the land is consistent with Water Corporation infrastructure planning for the area, as indicated in the Engineering Services Report.	Noted.	That the submission be noted.
7.	Department of Biodiversity, Conservation and Attractions (Parks and Wildlife Service) South West Region PO Box 1693 BUNBURY WA 6231	1. The existing approved Port Geographe Development Plan (PGDP) contains a list of 33 conditions that apply to the development, and from these DBCA considers condition 11 may still be relevant and conditions 12, 13, parts of 14, 28 (possibly) and 33 should apply. Condition 33 and parts of 14, which includes standards applicable to 33, being the most important.	1. A number of the conditions listed on the PGDP are no longer relevant to the development, or cannot be held as a responsibility to the current developer. A full review of the PGDP and the provisions of the Port Geographe Development Area within the Scheme is anticipated to be undertaken following determination of the Structure Plan currently under consideration. This review will evaluate subdivision and development requirements in terms of relevance to the area, in particular environmental considerations, and who is responsible for those requirements. As part of this process the Port Geographe Development Plan will need to be brought into full compliance with the Regulations, including the now standard Structure Plan report layout. It	

	ALAMAE O ADDRESS	NATURE OF CURNAUCCION	CTAFF COMMENT	CTAFF RECOMMENDATION
No	NAME & ADDRESS	NATURE OF SUBMISSION	STAFF COMMENT	STAFF RECOMMENDATION
			is also critical that 'planning closure' is made	
			on the canals, although this may not be	
			possible until such time as the developer	
			submits a proposal on 'Area 2' of Lot 9002.	
		2. It is noted that DBCA was not consulted by the proponent during preparation of the draft Structure Plan, but there are existing commitments relating to the Port Geographe development that impacts upon the adjacent Vasse conservation reserve, in relation to landscaping and fencing of the wetlands buffer, and drainage along the southern side of Layman Road. These commitments are important to manage ongoing influences of residential development adjacent to the Conservation reserve and Ramsar wetlands. Parts of the drainage swale along the southern side of Layman Road are within the conservation reserve, and these are an	2. Deed of Variation to the Port Geographe Management Deed	
		essential part of the development drainage plan.		
8	Department of Eiro and	3. The former Development Guide Plan (PGDP) included height restrictions for houses around the perimeter of the development along Layman Road which DBCA considers should be retained. A key reason for this was to ensure that building lights (internal and external) would not be visible from the wetlands which would otherwise provide light sources that will attract mosquitos and midge insects from the wetlands to the development. Taller buildings around the perimeter are also most likely to have a bigger effect in altering the visual landscape of views from the wetlands system.	3. Height restrictions along Layman Road are retained within the Scheme. Furthermore, under the <i>Planning and Development (Local Planning Schemes) Regulations 2015</i> , provisions such as this (height controls) should be located within the Scheme, rather than within a Structure Plan.	That the submission be noted
8.	Department of Fire and	Policy Measure 6.3 a) (ii) BAL Contour Map	Officers are confident to agree this area will be	That the submission be noted.
	Emergency Services	Areas of Plot 4 to the north-east of the site (Local	either permanently cleared of vegetation	

No	NAME & ADDRESS	NATURE OF SUBMISSION	STAFF COMMENT	STAFF RECOMMENDATION
	PO Box P1174	Structure Plan Area 2) have been excluded from	(excluded under 2.2.3.2(e) as they are roads	
	Perth WA 6844	classification with no justification or photographic	and/or canals) or managed in a low fuel state	
		evidence. It is unclear what enforcement	(excluded under 2.2.3.2(f) being subdivided into	
		mechanism exists to ensure these plots are	residential lots). However, it is noted that this	
		maintained as "low threat" vegetation in	information will need to be clarified by the	
		accordance with Schedule 1 of the Guidelines, in	applicant at subsequent planning stages.	
		perpetuity. If the exclusion of Plot 4 cannot be		
		substantiated, the vegetation classification should		
		be revised to apply the worst case scenario as per		
		AS 3959.		
		DFES acknowledge that this exclusion is minor,		
		and may not impact the BHL Assessment or		
		subsequent BAL impacts. DFES request that		
		additional justification is provided at subsequent		
		planning stages, to allow verification by decision		
		makers and referral agencies, as the resultant BAL		
		rating impacts on future development may be		
		inaccurate.		
		Recommendation – supported subject to minor		
		modifications		
		The BMP has adequately identified the issues		
		arising from the bushfire risk assessment and		
		considered how compliance with the bushfire		
		protection criteria can be achieved at subsequent		
		planning stages.		
		However, minor modifications (as detailed above)		
		to the BMP are necessary to ensure it accurately		
		identifies the bushfire risk and necessary		
		mitigation measures. As these modifications will		
		not affect the material considerations of the		
		structure plan, DFES recommends the proponent		
		be advised that these modifications be		
		undertaken to support subsequent stages of the		
<u> </u>		planning process (subdivision & development).		
9.	Department of Planning,	The site has a direct link to the open ocean	This information is consistent with pre-	That the submission is noted,
	Lands and Heritage	through the Port Geographe marina and is	consultation advice received from the	however the Western Australian
	(Policy)	vulnerable to coastal processes such as	Department of Planning, Lands and Heritage and	Planning Commission is respectfully

No	NAME & ADDRESS	NATURE OF SUBMISSION	STAFF COMMENT	STAFF RECOMMENDATION
	Locked Bag 2506	inundation. The development of this site is not	is discussed within the body of the report.	requested to consider the matter
	Perth WA 6001	considered infill development and as such the	, '	holistically and consider that a more
		most appropriate course of action in accordance	Whilst the City is not in a position to offer an	flexible approach to the assessment
		with clauses 5.5 (iii)(1) and 5.9 of SPP2.6 would be	alternate view, a sound outcome would result in	of the development against SPP2.6
		to <i>avoid</i> new development in the area identified	levels higher than the 2.5m proposed by the	might be available.
		to be at risk. Recognised that this may not be the	applicant but lower than the 3.8m offered by	Ü
		preferred option in this instance, and	State agencies.	The applicant is also required to
		development could potentially be considered if		submit a more detailed assessment
		the NGSP is able to demonstrate that the risk of		against SPP2.6, using appropriate
		inundation can be accommodated, for example,		methods as detailed in the DoT
		by filling to an appropriate finished floor level		submission, being the investigation
		(FFL).		of 1 in 500yr open ocean flooding in
		The site is vulnerable to estuarine flooding from		a 100yr planning timeframe.
		the Vasse-Wonnerup Estuary to the south. SPP2.6		,
		Schedule One considers the allowance for		
		inundation to be based on a 1 in 500yr tropical		
		cyclone event plus a 0.9m allowance for vertical		
		sea level rise over a 100 year planning timeframe.		
		The proposed minimum residential FFL appears to		
		only consider inundation levels up until the year		
		2070 and it is unclear whether sea level rise has		
		been accounted for in both the 1 in 500 year		
		storm event and 1 in 100 year storm event		
		modelling.		
		In addition, due to the proximity of the Port		
		Geographe marina to the northeast the site is also		
		vulnerable to inundation from ocean flooding. The		
		NGSP report and Appendix C do not appear to		
		have included this as a consideration in the		
		modelling. The Coastal Infrastructure branch of		
		the Department of Transport has calculated a		
		+3.8mAHD ocean inundation level over the		
		required 100yr planning timeframe in accordance		
		with SPP2.6.		
		In the absence of 1 in 500yr open ocean and		
		estuarine flood modelling for a 100 year		
		timeframe, approval of the NGSP should not be		
		granted until such time as these matters have		

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No	NAME & ADDRESS	NATURE OF SUBMISSION	STAFF COMMENT	STAFF RECOMMENDATION
		been clarified and resolved through redesign		
		and/or increased FFL of the at risk areas. The		
		NGSP should be amended accordingly.		

SCHEDULE OF MODIFICATIONS

DP18/0001: Newport Geographe Structure Plan

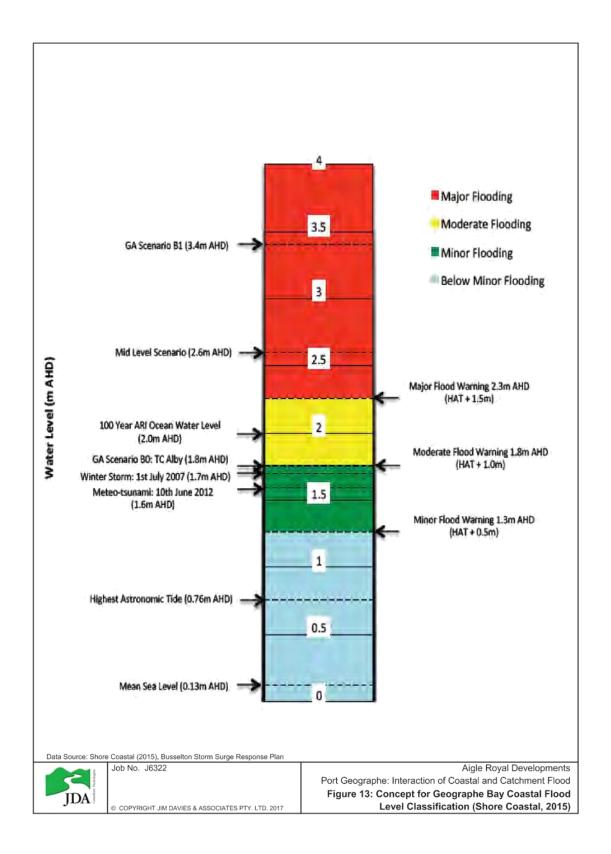
ATTACHMENT F – SCHEDULE OF

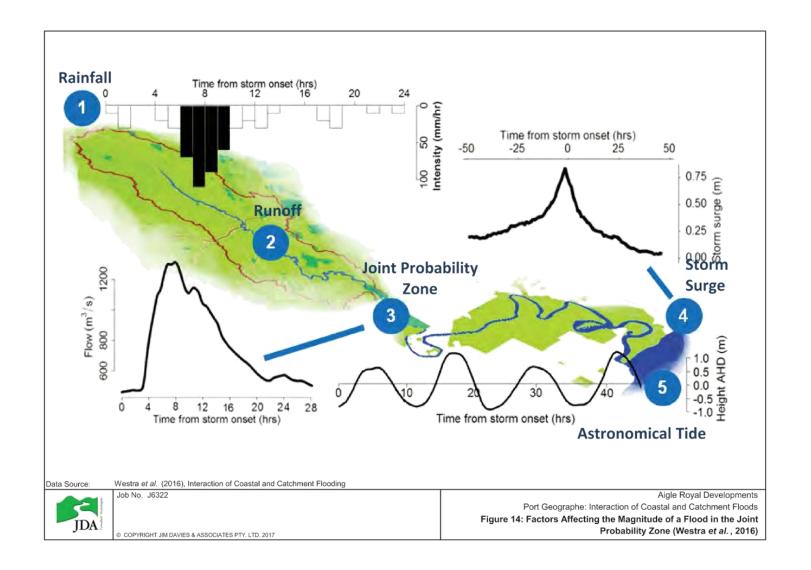
10 April 2019

No.	Proposed Modification	Reason
1.	That the Structure Plan be modified to identify an appropriate finished floor level that meets the requirements of <i>State Planning Policy 2.6: State Coastal Planning Policy</i> (SPP2.6), including provision of a more detailed assessment against SPP2.6 by the applicant, being the investigation of 1 in 500yr open ocean flooding in a 100yr planning timeframe.	The Structure Plan proposal is not currently consistent with SPP2.6.
2.	Revision of the <i>Local Water Management Strategy</i> at Appendix C of the Structure Plan report to the satisfaction of the Department of Water and Environmental Regulation and the City of Busselton, prior to the final approval of the Structure Plan.	To resolve a number of outstanding technical issues within the LWMS prior to approval of the Structure Plan. It is noted that the resolution of the finished floor levels matter will be required before the LWMS is finalised.
3.	Modify the Structure Plan to ensure that the minimum 10% Public Open Space requirement of Liveable Neighbourhoods 2015 is met, in accordance with the provisions set out therein.	To ensure an appropriate amount of Public Open Space is provided within the development area.
4.	Modify the Structure Plan map as set out in the attached plan at Attachment 'X' of the Council Report.	To provide an appropriate layout and design for Public Open Space and residential density in accordance with <i>Liveable Neighbourhoods</i> .
5.	Modify the Structure Plan report such that the Public Open Space areas '6' and '7' are removed from the Public Open Space calculation, in accordance with the requirements of <i>Liveable Neighbourhoods</i> .	Public Open Space areas '6' and '7' do not comply with the <i>Liveable Neighbourhoods</i> requirements for Public Open Space. These areas would more suitably be identified as Public Access Ways.
6.	Modify the Structure Plan at Part 1, section 4 to insert the requirement that prior to the subdivision approval for the applicable stage, consideration be given for the development of roundabouts at the intersections with Layman Road.	To provide for efficient and safe access and egress at those intersections and act as traffic calming devices along Layman Road.
7.	Modify the <i>Transport Impact Assessment</i> at Appendix G of the Structure Plan report to remove the Service Road connecting with Layman Road between the two main access roads into the development.	This service road has the potential to create conflict with traffic utilising those intersections and generally on Layman Road and should be removed. This impact is exacerbated without the provision of roundabouts at the intersections.

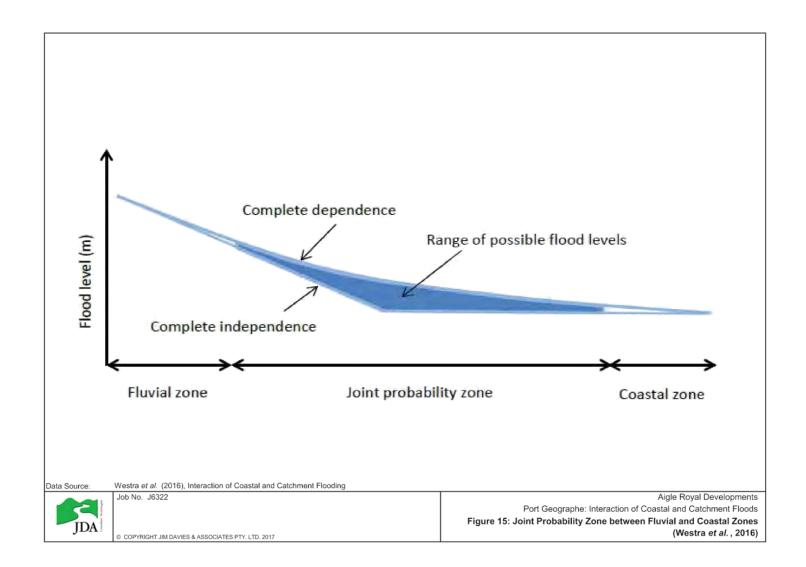
No.	Proposed Modification	Reason
8.	Modify the Structure Plan and the <i>Transport Impact Assessment</i> at Appendix G of the Structure Plan report to provide for on-street parking adjacent to Public Open Space areas, in accordance with <i>Liveable Neighbourhoods</i> .	To ensure these parking areas can be accommodated within the proposed road reserves and to reflect the requirements of <i>Liveable Neighbourhoods</i> .
9.	Modify the <i>Transport Impact Assessment</i> at Appendix G of the Structure Plan report to include a detailed review of traffic generated externally to the Structure Plan area that may utilise the 'Ostia Way to Waterline View' route.	To enable appropriate assessment of the impacts of additional traffic along Ostia Way and Waterline View as a result of the development. The assessment should also determine whether an increase to the Waterline View road reserve would be necessary as a result of the development.



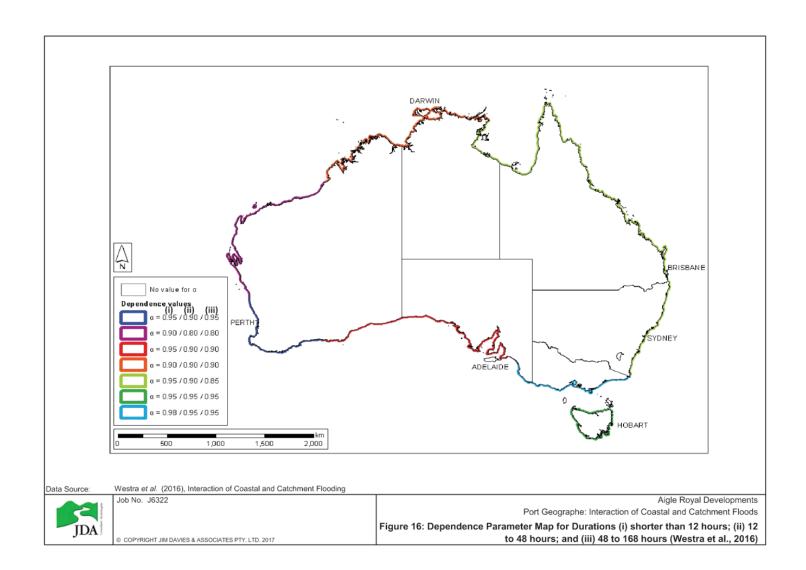




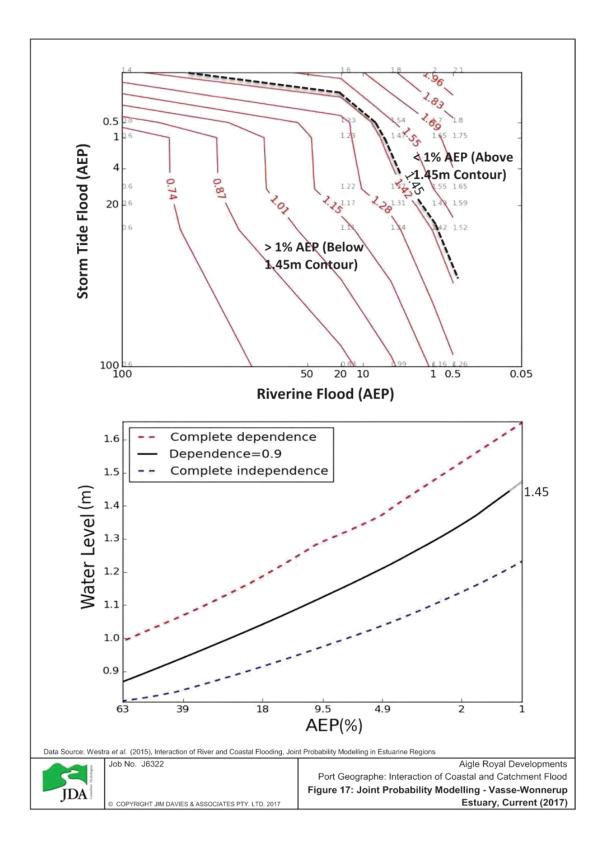
Attachment M JDA Report October 2017 Part B



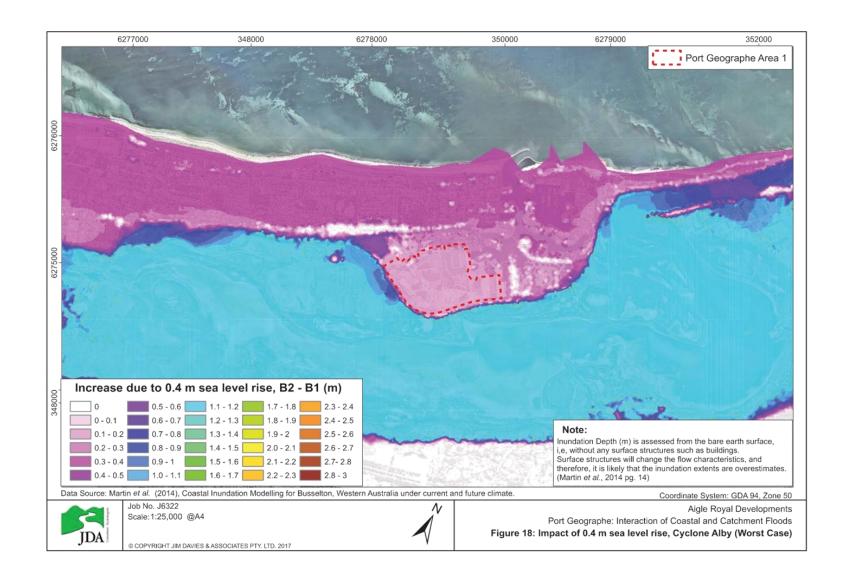
JDA Report October 2017 Part B



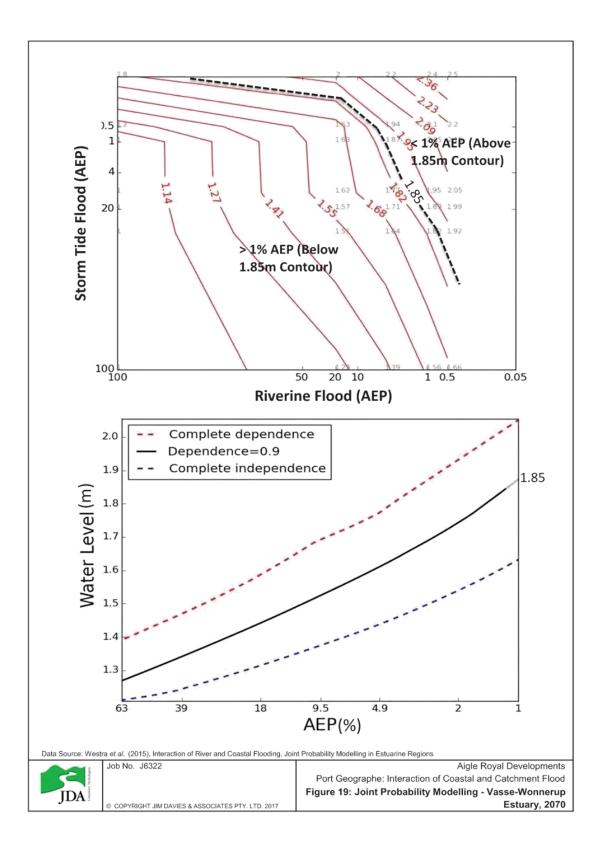
10 April 2019



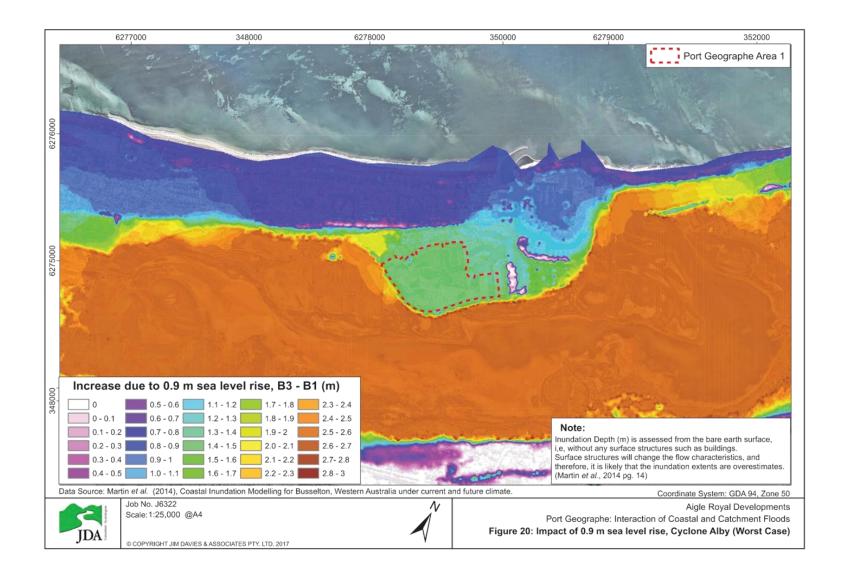
Attachment M JDA Report October 2017 Part B



10 April 2019



Attachment M JDA Report October 2017 Part B



13.2 Attachment M

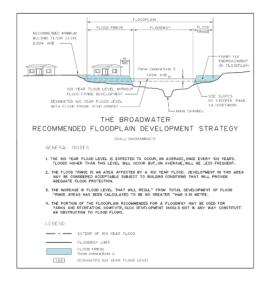
APPENDICES

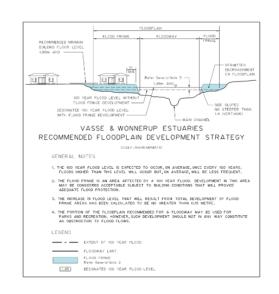
13.2 Attachment M

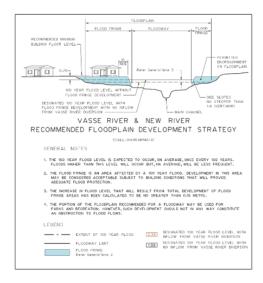
APPENDIX A

10 April 2019

Busselton Regional Flood Study, Recommended Floodplain Development Strategies BUSSELTON REGIONAL FLOOD STUDY
RECOMMENDED FLOODPLAIN DEVELOPMENT STRATEGIES







13.2 Attachment M

APPENDIX B

Recommended Allowance for Sea Level Rise in Coastal Planning for WA (Bicknell, 2010)

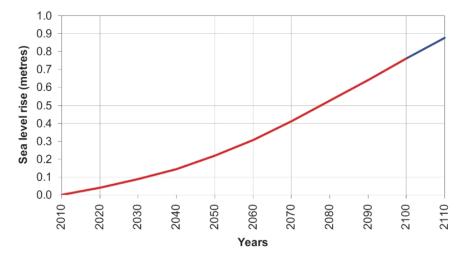


Figure 16 - Recommended allowance for sea level rise in coastal planning for WA (red line SRES scenario A1FI 95th percentile after Hunter (2009), normalised to 2010, blue line continuation of scenario to 2010)

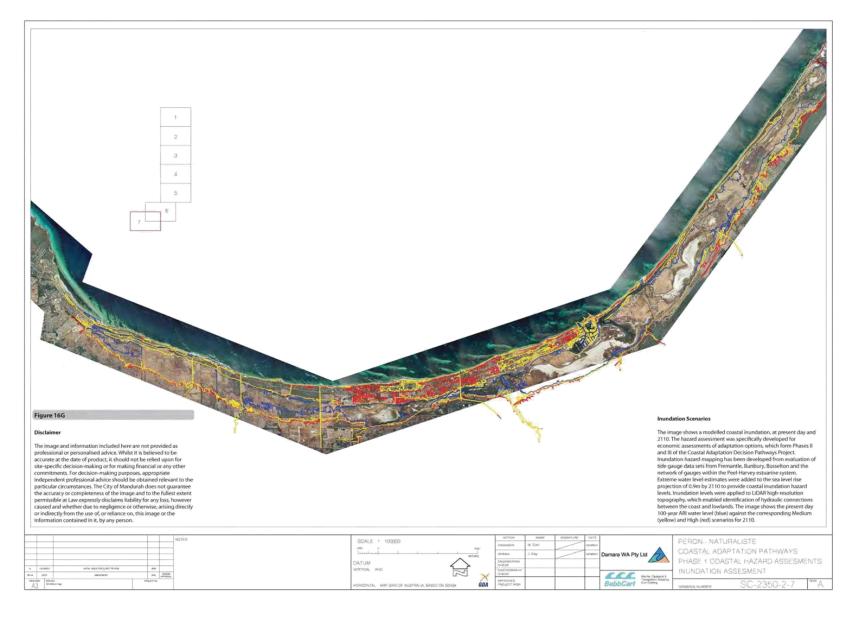
13.2 Attachment M

APPENDIX C

10 April 2019

Coastal Inundation Mapping, Geographe Bay (Damara, 2012)

150 Attachment M JDA Report October 2017 Part B



13.2 At

Attachment M

JDA Report October 2017 Part B

APPENDIX D

Coastal Inundation Mapping – Minor, Mid-Level and Major Events (Shore Coastal, 2015)





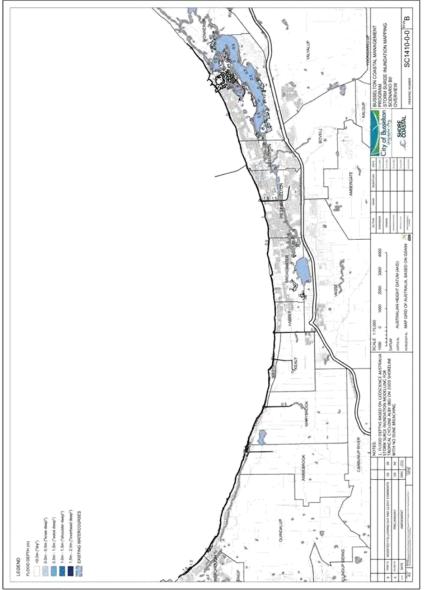


Figure 4.9 Summary map B0 (1.8m AHD)





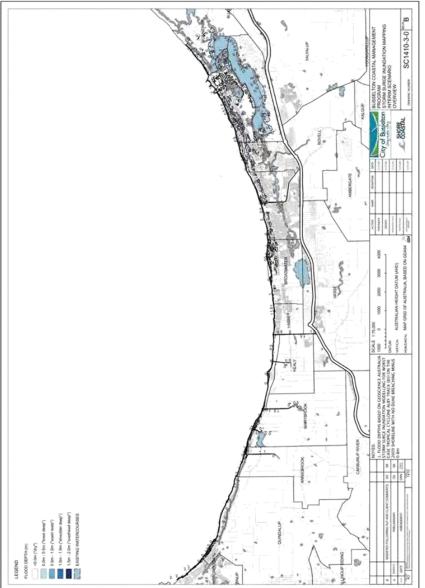


Figure 4.10 Mid Level Flooding Impacts (2.6m AHD)





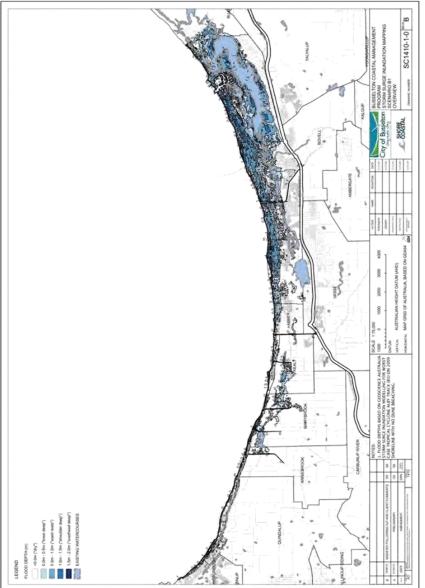


Figure 4.12 Summary map B1 Scenario (3.4m AHD)

10 April 2019

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14. ENGINEERING AND WORK SERVICES REPORT

Nil

15. COMMUNITY AND COMMERCIAL SERVICES REPORT

Nil

16. FINANCE AND CORPORATE SERVICES REPORT

16.1 CONSIDERATION OF THE CONDUCT OF LOCAL GOVERNMENT ELECTION, 19 OCTOBER 2019

SUBJECT INDEX: Elections and Electoral Procedures

STRATEGIC OBJECTIVE: Governance systems, process and practices are responsible, ethical

and transparent.

BUSINESS UNIT: Governance Services **ACTIVITY UNIT:** Governance Services

REPORTING OFFICER: Governance Coordinator - Emma Heys

AUTHORISING OFFICER: Director Finance and Corporate Services - Tony Nottle

VOTING REQUIREMENT: Absolute Majority

ATTACHMENTS: Nil

PRÉCIS

The next local government election is due to be held on 19 October 2019.

In accordance with Part 4 of the *Local Government Act 1995* (the Act), Council must decide on the method on which a local government election is conducted. The Council may choose between an inperson election, or a postal election conducted by the Western Australian Electoral Commission (WAEC) on behalf of the local government.

The City has received from the WAEC the cost estimate of conducting a postal ballot for the 2019 local government election, which is based on a full cost recovery model.

In accordance with section 4.61(2) of the Act, an absolute majority decision of Council is required when deciding on the ballot method for the local government election and the City must provide advice of this to the Electoral Commissioner for Western Australia (the Commissioner) at a minimum of 80 days prior to polling day.

BACKGROUND

Local government elections occur on the third Saturday in October every two years. Elected Members each serve a term of four years. The City of Busselton has five ordinary vacancies for the 2019 election.

The Act provides that a local government may decide whether to conduct a postal or in-person election. Legislation requires that where a local government chooses to hold a postal election, the election is to be run by the WAEC. The City of Busselton has chosen this method for the previous 18 years.

STATUTORY ENVIRONMENT

Part 4 of the *Local Government Act 1995* provides for the conduct of local government elections.

The Local Government (Elections) Regulations 1997 and the Local Government (Constitution) Regulations 1998 provide for the conduct of local government elections.

RELEVANT PLANS AND POLICIES

There are no relevant plans or policies to consider in relation to this matter.

FINANCIAL IMPLICATIONS

The WAEC conduct postal elections on behalf of local governments on a full cost recovery basis. The City has received a cost estimate from the WAEC to conduct the postal ballot for the 2019 election of \$117,000 inclusive of GST, based on a range of assumptions detailed in the officers' comment. This excludes any advertising or staff resourcing costs.

In 2017, the WAEC estimated the cost of election to the City to be \$107,000, however the actual cost was only \$92,331, a decrease of approximately 13.7%. In addition, expenses were incurred by the City for local advertising and for the cost of City staff required to assist with the vote count on the evening of the election.

If the Council were to choose to conduct the local government election in-house, the financial implications to be considered include the cost of:

- the production and printing of all election materials;
- advertising of both statutory requirements and local promotional material;
- resourcing of a Returning Officer and a minimum of three staff members to man the polling booths for 10 hours on polling day and additional staff to assist in the vote count at the closing of the poll.

Based on research and advice given in previous election years, is reasonable to conclude that the costs for the City to conduct an in-person election would be at least equal to, but are likely to be more than, the cost to engage the WAEC to conduct a postal election.

Adequate funding has been provided in the draft 2019-2020 budget.

LONG-TERM FINANCIAL PLAN IMPLICATIONS

The City's long term financial plan has provision for the conduct of a postal election by the WAEC every two years.

STRATEGIC COMMUNITY OBJECTIVES

The officer recommendation primarily aligns with the following Key Goal Area and Community Objective of the City of Busselton's Strategic Community Plan 2017:

Key Goal Area 6 – Leadership: Visionary, collaborative, accountable.

6.1 Governance systems, process and practices are responsible, ethical and transparent.

RISK ASSESSMENT

An assessment of the potential implications of implementing the officer recommendation has been undertaken using the City's risk management framework. Risks are only identified where the individual risk, once controls are identified, is medium or greater. No such risks have been identified.

CONSULTATION

No external consultation was undertaken or considered necessary in relation to this matter.

OFFICER COMMENT

As in previous election years, the City has received written advice from the WAEC regarding the method by which the 2019 local government election may be conducted. In accordance with section 4.20(4) of the *Local Government Act 1995*, the Commissioner has agreed to be responsible for the conduct of the 2019 election, as a postal ballot, at the estimated cost of \$117,000, based on the following assumptions:

- 28,000 electors
- Response rate of 38%
- 5 vacancies
- Count to be conducted at the offices of the City of Busselton
- The appointment of a local Returning Officer
- Regular Australia Post delivery service to apply for the lodgement of the elections packages.

Expenses that are excluded from the cost estimate include, but may not be limited to:

- Any legal expenses other than those that are determined to be borne by the Western Australian Electoral Commission in a Court of Disputed Returns;
- One local government staff member to work in the polling place on election day;
- Any additional postage rate increase from Australia Post.

The Commissioner is responsible for conducting postal elections in Western Australia. With voting in local government elections not being compulsory, postal elections have typically resulted in a higher participation rate by eligible electors than the alternative in-person ballots, as they offer most electors greater convenience and accessibility. This is especially true for local governments with a large elector base and a high percentage of absentee owners.

Engaging the WAEC to conduct the local government election allows for the Chief Executive Officer and staff to remain independent of the electoral process with the WAEC able to ensure elections are conducted with impartiality.

CONCLUSION

Of the options currently available to Council for the running of a local government election, a postal ballot conducted by the WAEC is considered the best method by which to hold the 19 October 2019 election.

OPTIONS

Council may choose to instead conduct an in-person election.

TIMELINE FOR IMPLEMENTATION OF OFFICER RECOMMENDATION

In accordance with the Act, the City will notify the WAEC of Council's choice of how the election will be conducted at least 80 days prior to polling day.

OFFICER RECOMMENDATION

That the Council:

- Declares in accordance with section 4.20(4) of the Local Government Act 1995, the Electoral Commissioner for Western Australia to be responsible for the conduct of the 19 October 2019 election, together with any other elections or polls that may be required; and
- 2. Decides, in accordance with section 4.61(2) of the Local Government Act 1995 that the election is conducted as a postal election.

16.2 STRATEGIC COMMUNITY PLAN 2017 MINOR REVIEW AND PROPOSED AMENDMENTS

SUBJECT INDEX: Strategic Community Planning

STRATEGIC OBJECTIVE: Governance systems, process and practices are responsible, ethical

and transparent.

BUSINESS UNIT: Corporate Services

ACTIVITY UNIT: Governance

REPORTING OFFICER: Corporate Planning Officer - Cathy Burton

Manager Governance and Corporate Services - Sarah Pierson

AUTHORISING OFFICER: Director Finance and Corporate Services - Tony Nottle

VOTING REQUIREMENT: Absolute Majority

ATTACHMENTS: Nil

PRÉCIS

The minor review of the Strategic Community Plan (SCP) 2017 was undertaken in the period 30 January 2019 to 25 February 2019. Consequently, a number of minor amendments to the SCP are proposed. Any amendment must be adopted by an absolute majority of Council.

BACKGROUND

A strategic community plan must be reviewed at least once every four years, with the Integrated Planning and Reporting Guidelines (2016) recommending that a review is conducted every two years, alternating between a minor review and a major review. The City of Busselton SCP 2017 was adopted by Council in February 2017. The SCP has an outlook of at least 10 years and sets out six key community goals and 21 community objectives.

The minor review of the Council's SCP 2017 began on 30 January 2019. Although community engagement is not required as part a minor review, Council sought input from the community via a survey on the City's Your Say Busselton website to help determine how well the SCP strategies are working to achieve the community's objectives. A total of 396 visits to the survey page were recorded and 77 responses submitted, with the survey closing on 25 February 2019.

Input was also invited from City's officers to assist with reviewing the effectiveness of the SCP 2017 strategies. Officers identified matters that they believe have either emerged or accelerated over the past two years and looked at whether the SCP 2017 strategies were responding to those matters.

The combined results of these two engagement activities was presented to Council on 20 March 2019.

STATUTORY ENVIRONMENT

Section 5.56 of the *Local Government Act 1995* requires a local government to plan for the future of the district. Regulation 19 (C) of the *Local Government (Administration) Regulations 1996* outlines the following minimum requirements to achieve this:

- 1) A local government is to ensure that a strategic community plan is made for its district in accordance with this regulation in respect of each financial year after the financial year ending 30 June 2013.
- 2) A strategic community plan for a district is to cover the period specified in the plan, which is to be at least 10 financial years.

- 3) A strategic community plan for a district is to set out the vision, aspirations and objectives of the community in the district.
- 4) A local government is to review the current strategic community plan for its district at least once every 4 years.
- 5) In making or reviewing a strategic community plan, a local government is to have regard to
 - (a) the capacity of its current resources and the anticipated capacity of its future resources; and
 - (b) strategic performance indicators and the ways of measuring its strategic performance by the application of those indicators; and
 - (c) demographic trends.
- 6) Subject to subregulation (9), a local government may modify its strategic community plan, including extending the period the plan is made in respect of.
- 7) A council is to consider a strategic community plan, or modifications of such a plan, submitted to it and is to determine* whether or not to adopt the plan or the modifications.
 - *Absolute majority required.
- 8) If a strategic community plan is, or modifications of a strategic community plan are, adopted by the council, the plan or modified plan applies to the district for the period specified in the plan.
- 9) A local government is to ensure that the electors and ratepayers of its district are consulted during the development of a strategic community plan and when preparing modifications of a strategic community plan.
- 10) A strategic community plan for a district is to contain a description of the involvement of the electors and ratepayers of the district in the development of the plan or the preparation of modifications of the plan.

RELEVANT PLANS AND POLICIES

There are no City of Busselton plans or policies that relate to a minor review of the SCP. The SCP 2017 is a key strategic document however and sets the overarching strategic direction for the City's Corporate Business Plan which has a four year delivery timeframe and is reviewed annually, and, in an iterative fashion, provides direction for and is informed by the Long Term Financial Plan.

FINANCIAL IMPLICATIONS

There are no immediate financial implications arising from the officer recommendation.

LONG-TERM FINANCIAL PLAN IMPLICATIONS

There are no immediate long term financial plan implications arising from the officer recommendation.

STRATEGIC COMMUNITY OBJECTIVES

The officer recommendation aligns with the following Key Goal Area and Community Objective of the City of Busselton's Strategic Community Plan 2017:

Key Goal Area 6: Leadership

6.1: Governance systems, process and practices are responsible, ethical and transparent

6.2: Council engages broadly and proactively with the community.

RISK ASSESSMENT

Given the minor nature of the proposed amendments there are not considered to be any risks of a medium or greater level associated with the officer recommendation.

CONSULTATION

Your Say Survey

The Your Say survey opened on Wednesday 30 January and closed on Sunday 25 February, and was advertised in four editions of the Busselton-Dunsborough Mail newspaper in Council's City Connect page. Additionally the survey was advertised via the City's Bay to Bay newsletter and email distribution list.

At the close of the community engagement period 77 responses had been received. The demographic details of respondents are illustrated below.

Residential postcode	Responses
6280 (Busselton area	27 (35%)
6281 (Dunsborough area)	45 (58%)
6282 (Yallingup area)	5 (7%)

Age profile						
Under 18 years	1					
18-34 years	7					
35-54 years	49					
55+ years	20					

Respondents were asked to rate the City's progress in each of the six Key Goal Areas by choosing one of the following options –

(i) Unsure, (ii) No Progress, (iii) Poor, (iv) Okay, (v) Good and (vi) Excellent.

Results are provided below.

Key Goal Area 1: Community

Overall, respondents' assessment of progress in Key Goal Area 1 was positive, with answers to four of the six scenarios being rated favourably. The standout success was the City's support for community events with 80% of respondents scoring performance as 'Okay' and better. Providing quality sport and recreation facilities was rated less favourably: only 42.9% of respondents rated progress as 'Okay' or better.

Table 1. Key Goal Area 1 Community:

Progress ratings	Unsure	No Progress	Poor	Okay	Good	Excellent	Okay to Excellent
(i) Improving opportunities to be involved and connected with the community	10.4%	7.8%	22.1%	33.8%	24.7%	1.3%	59.8%
(ii) Providing safe and secure public areas	6.6%	10.5%	19.7%	31.6%	25.0%	6.6%	63.2%
(iii) Providing quality community sport and recreation facilities	3.9%	37.7%	15.6%	15.6%	19.5%	7.8%	42.9%
(iv) Improving community facilities and cultural attractions	3.9%	14.5%	18.4%	30.3%	23.7%	9.2%	63.2%
(v) Supporting events that bring the community together	2.7%	8.0%	9.3%	24.0%	41.3%	14.7%	80.0%
(vi) Improving access to City services and facilities for people with a disability	35.1%	15.6%	10.4%	16.9%	13.0%	9.1%	39.0%

Key Goal Area 2: Places and Spaces

The ratings given in Key Goal Area 2 were again positive, with only one area, 'guiding and managing growth and development...' being rated unfavourably. In this instance, only 38.1% of respondents provided a score of 'Okay' or better.

Table 2. Key Goal Area 2 Places and Spaces:

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Progress ratings	Unsure	No progress	Poor	Okay	Good	Excellent	Okay to Excellent
(i) Developing family friendly foreshore reserves	0.0%	5.2%	9.1%	16.9%	35.1%	33.8%	85.8%
(ii) Creating and maintaining parks and reserves	0.0%	3.9%	11.7%	33.8%	32.5%	18.2%	84.5%
(iii) Providing high quality public amenities	2.6%	13.0%	19.5%	28.6%	24.7%	11.7%	65.0%
(iv) Developing and improving town centres	0.0%	11.7%	27.3%	28.6%	24.7%	7.8%	61.1%
(v) Guiding and managing growth and development of the District	7.9%	28.9%	25.0%	26.3%	10.5%	1.3%	38.1%

Key Goal Area 3: Environment

Overall the ratings of progress in Key Goal Area 3 indicate that there is some lack of understanding about what the City is doing with respect to managing the environment and environmental impacts. 40% of respondents were unsure of the City's efforts to reduce its carbon footprint and in regard to the work being done to improve the health of the City's waterways, almost 30% of respondents were unsure about the progress that has been made. Pleasingly however 61% of respondents scored performance as 'Okay' and better in response to 'identifying and respecting environmental values and habitats'.

Table 3. Key Goal Area 3 Environment: SCP 2017 progress ratings

Progress ratings	Unsure	No progress	Poor	Okay	Good	Excellent	Okay to Excellent
(i) Identifying and respecting environmental values and habitats	10.7%	6.7%	21.3%	29.35%	26.7%	5.3%	61.35%
(ii) Taking steps to reduce the City's carbon footprint by reducing operational emissions	40.0%	8.0%	16.0%	20.0%	13.3%	2.7%	36.0%
(iii) Overall management of our coastline	6.8%	15.00%	13.0%	35.0%	15.0%	8.0%	58.0%
(iv) Improving waste management through wast avoidance, reduction, re- use and recycling practices	10.7%	21.3%	20.0%	29.3%	14.7%	4.0%	48.0%
(v) Working to improve the health of the Lower Vasse River, Toby Inlet and Vasse- Wonnerup wetlands	29.7%	5.4%	18.9%	28.4%	10.8%	6.8%	46.0%
(vi) Responding to and managing fire and other environmental emergencies	26.7%	4.0%	12.0%	16.0%	33.3%	8.0%	57.3%

Key Goal Area 4: Economy

As in Key Goal Area 1, the City's involvement in promoting and hosting events was again rated highly, with almost 92% of respondents giving a score of 'Okay' or better. Our work to encourage and support local business and advocate for improved training and education was not rated more poorly.

Table 4. Key Goal Area 4 Economy: SCP 2017 progress ratings

Progress ratings	Unsure	No progress	Poor	Okay	Good	Excellent	Okay to Excellent
(i) Promoting and hosting regional events	1.4%	4.1%	2.7%	24.3%	35.1%	32.4%	91.8%
(ii) Developing the Busselton Margaret River airport to support aviation and freight	16.2%	14.9%	21.6%	24.3%	17.6%	5.4%	47.3%
(iii) Encouraging business attraction and investment	20.5%	16.4%	26.0%	23.3%	11.0%	2.7%	37.0%
(iv) Working with partners to help support and stimulate local businesses	31.1%	13.5%	17.6%	20.3%	14.9%	2.7%	37.9%
(v) Advocating for improved training and education opportunities	35.6%	20.5%	15.1%	20.5%	8.2%	0.0%	28.7%

Key Goal Area 5: Transport

Overall progress was rated reasonably well with approximately 60% of respondents giving 'improving road conditions across the District' and 'Providing safe cycle ways and footpaths...' a score of 'Okay' or better. Respondents indicated that progress with respect to public transport and development of the Busselton Margaret River Airport was seen as poorer; with the provision of both being reliant on other key stakeholders.

Table 5. Key Goal Area 5 Transport: SCP 2017 progress ratings

Progress ratings	Unsure	No progress	Poor	Okay	Good	Excellent	Okay to Excellent
(i) Developing the BMRA to support air services to the east coast of Australia	22.7%	28.0%	12.0%	16.0%	18.7%	2.7%	37.4%
(ii) Working with public transport providers to improve public transport services and associated facilities within the District	21.3%	25.3%	18.7%	20.0%	13.35%	1.3%	34.65%
(iii) Providing safe cycle ways and footpaths that connect with key destinations	1.3%	16.0%	21.3%	26.7%	26.7%	8.0%	61.4%
(iv) Improving road conditions across the District	0.0%	13.3%	22.7%	44.0%	18.7%	1.3%	64.0%
(v) Improving the ease of access within our town sites	1.4%	21.6%	18.9%	29.75%	20.3%	8.1%	58.15%

Key Goal Area 6: Leadership

Pleasingly over 61% of responses rated the maintenance of community assets as 'Okay' or better. Perhaps not surprisingly, other areas, such as long term financial planning and improving organisational performance and services, were rated lower, with respondents being unsure as to the progress being made. This represents an opportunity for increased information and engagements with the community.

Table 6. Key Goal Area 6 Leadership: SCP 2017 progress ratings

Progress ratings	Unsure	No progress	Poor	Okay	Good	Excellent	Okay to Excellent
(i) Provide opportunities for the community to participate in decision making processes	9.5%	23.0%	16.2%	24.3%	20.3%	6.8%	51.4%
(ii) Improving two way communication with the community using a range of accessible communication channels	16.2%	24.3%	18.9%	17.6%	16.2%	6.8%	40.6%
(iii) Ensuring the City's long term financial plan delivers community goals and aspirations in a sustainable and affordable manner	28.4%	21.6%	14.9%	18.9%	14.9%	1.4%	35.2%
(iv) Maintaining community assets at a standard that you believe to be appropriate	13.7%	12.3%	12.3%	31.5%	21.9%	8.2%	61.6%
(v) Continuously improving the City's organisational performance and services	34.2%	16.4%	15.1%	24.7%	8.2%	1.4%	34.3%

In addition to the above ratings of progress, respondents were asked to nominate one thing over the past two years that, (a) had been done well, and (b) could have been done better.

Overall, responses to this question indicated that the City had performed well with regard to-

- Redeveloping the Busselton and Dunsborough foreshores, and in particular the Busselton Foreshore was highlighted;
- Improving the Dunsborough town site;
- Continuing to work to improve the health of waterways;
- Developing the Busselton Margaret River Airport;
- Attracting events and tourism;
- Improving cycle ways, and
- Engaging with the community.

In the 'could have done better' category, responses included requests for –

- more sport and recreation facilities in Dunsborough (including a swimming pool);
- better youth services and social infrastructure;
- improved access to City services and facilities for people with a disability;
- a better planning response to population growth, specifically in Dunsborough;
- faster progress of the Busselton Margaret River Airport redevelopment;
- greater support for business and youth employment; and
- improved and extended paths and cycle ways.

Workshop with City Officers

The workshop with City Officers highlighted emerging or accelerating issues that they have observed within the Busselton community over the past two years. The key themes identified are listed in the table below by Key Goal Area.

Table 7: Issues identified in 31 January workshop with City Officers

Key Goal Area 1	 Social hardship and increasing disadvantage (e.g. homelessness)
Community	 Drug and alcohol, mental health and related problems
	Reconciliation with Aboriginal People
	Emergency management
	 Grassroots advocacy for community events and services
Key Goal Area 2	 Social infrastructure and its ability to keep pace with growth
Places and Spaces	 Busselton CBD activation (night life)
	 Health and fitness in suburban parks and gardens (vs focus on Busselton
	Foreshore)
	Heritage infrastructure
Key Goal Area 3	 Ongoing balance between environment, local flora and fauna and development.
Environment	 Waterways health and attractiveness
	Climate change
	 Increasing sensitivities and community values around habitat, conservation and
	green spaces.
Key Goal Area 4	 Expectations of City services with respect to economy
Economy	 Developing a town identify that focusses on economic investment.
Key Goal Area 5	 Growth in pedestrian activity outside of the CBD
Transport	 Access issues for users of mobility scooters (gophers)
	Bus routes for youth
	 Road design and the need for a dual lane road to Capel
Key Goal Area 6	International relations re trade and tourism
Leadership	 Organisational performance and service delivery
	 Innovation
	 Community participation versus community input in decision

City officers also suggested baseline data that could be usefully applied to assess whether we are successfully achieving the objectives of the SCP 2017. This is discussed further under Officer Comment.

The outcomes of the consultation have helped to inform the proposed amendments to the SCP 2017 objectives and strategies, noting the relatively small sample size, and the contained nature of a desktop review.

OFFICER COMMENT

The examination of community and City officer feedback regarding the progress and focus of the SCP 2017 showed that, in many instances, the issues raised are already adequately addressed within the SCP 2017 as its stands and that good progress is being made. However, some amendments are proposed in response, with amendments typically aimed at either narrowing or broadening the focus of the objective / strategy or seeking to streamline and more clearly articulate Council's role.

Additionally there are areas where additional attention may be required to either meet the community's objectives or to inform the community of initiatives being undertaken, for instance the development of a recreation master plan for the district.

The proposed amendments documented in Table 8 do not alter the overall focus of the SCP 2017 and are therefore considered to be minor. The proposed amendments will not therefore trigger the need for further consultation with the community. The community will however need to be informed of any adopted amendments to the plan.

Table 8. Proposed amendments to SCP 2017 objectives and strategies.

Key Goal Area	Theme	Proposal	Current objective/strategy	Proposed amendment
1	Social hardship, disadvantage and homelessness advocacy.	Amend strategy 1(a) to increase focus on identified vulnerable demographics	Explore way to improve social connectedness and inclusion.	Explore ways to improve social connectedness and inclusion in our community, in particular youth and those who are disadvantaged.
	Mental health and drug and alcohol issues.	Amend strategy 1(b) to reflect the need for a focus on specialist, mental health and substance support services	Engage with providers for the timely delivery of specialist health and other support services that assist all sectors of our community.	Advocate for and support providers to deliver specialist, mental health and substance support services.
	Service provision, youth, (themes as above)	Amend objective 1.4 to identify Council's role	Community services and programs that support people of all ages and backgrounds	Work with kay partners to provide a range of community services and programs that support people of all ages and backgrounds.
	Emergency management and community support to prepare for and recover from incidents.	Amend strategy 1(c) to broaden its focus	Work with the community and other key partners to create and maintain safe public areas.	Work with the community and other key partners to keep our community safe.

_	Hoolth and fitness	Amond strate = : 2/b) t-	Douglan and maintain	Continuo ta develer
2	Health and fitness activity in suburban parks and gardens, infrastructure and growth.	Amend strategy 2(b) to remove the focus on reserves which are covered in KGA 3 and include playgrounds	Develop and maintain rural and suburban parks and reserves for the enjoyment of the community.	Continue to develop and maintain rural and suburban parks and playgrounds for the enjoyment of the community.
3	Waterways: health and attractiveness.	Amend strategy 3(f) to broaden its focus	Continue to play a strong role as part of the Vasse Ministerial Taskforce to improve the health of waterways in the Geographe Catchment (including the Lower Vasse River, Toby Inlet and Vasse-Wonnerup wetlands).	Continue to work with key partners to improve the health of waterways in the Geographe catchment.
	Increased sensitivities and whole of community values around habitat, conservation and green space.	Amend strategy 3(c) to reflect the City's environment strategy as the key guiding document in this area.	Work with the community to identify and implement environmental sustainability initiatives.	Work with the community to implement the City's environment strategy.
4	Developing a town identity that focuses on, encourages and stimulates economic investment.	Amend strategy 4(c) to simplify its purpose and focus on diversification more generally	Develop and implement strategies that attract business investment, diversify the economy and provide a balance between large and small business.	Continue to attract and support business investment and diversity in the economy.
		Amend strategy 4(d) to focus on both new and existing local business	Work with key partners to develop initiatives that support new local business, including the activation of key business nodes.	Work with key partners to develop initiatives that support new and existing local businesses.
5	Increased pedestrian activity outside CBD.	Amend objective 5.3 to recognise the importance of pathways	Cycle ways that connect our communities and provide alternative transport choices.	Pathways and cycle ways that connect our communities and provide alternative transport choices.
	Dual lane vehicle transport between Busselton and Capel.	Amend strategy 5(b) to focus on the key priorities	Advocate for improved road infrastructure link to regional centres, including a dual lane road between Busselton and Capel and the Busselton-Bunbury outer bypass road, and Vasse-Dunsborough link.	Advocate for improved road infrastructure, in particular a dual land road between Busselton and Capel and a Vasse-Dunsborough link.

6.	Community participation in decision making processes versus community input into decision making processes.	Amend strategy 6(a) to more clearly reflect the role of the community in contributing to decision making.	Provide opportunities for the community to participate in decision making processes.	Provide opportunities for the community to contribute to decision making processes.
	Growth of digital communication within the community.	Amend strategy 6(b) to streamline and update the strategy.	Improve two way communication with the community using a range of accessible communication channels.	Engage with the community using a range of accessible two way communication channels.
	Council/City of Busselton accountability.	Amend strategy 6(c) to streamline and update the strategy.	Ensure the City's long term financial planning delivers the community goals and aspirations in a sustainable and affordable manner.	Deliver long term financial planning that helps to achieve community goals and aspirations in a sustainable and affordable manner.
	International relations with respect to trade and tourism.	Amend strategy 6(e) to reflect international alliances such as Sugito Sister City.	Actively participate in regional, state and national alliances to return benefit to the community.	Actively participate in regional, state, national and international alliances to return benefit to the community.

Measuring the success of the SCP 2017

Up to this point, the success of our strategic community planning has been measured by qualitative means such as community surveys and workshops. As was highlighted during the review of the 2015 Strategic Community Plan, suitable quantitative data can provide an added and perhaps more outcome focused perspective as to how well the community as a whole meeting its stated goals and objectives.

To this end, City officers are in the process of identifying readily available sources of baseline data that will help to demonstrate progress of the community's goals and objectives. The measures will be tested over the next 18 months to determine how well they substantiate progress, with the aim of adopting suitable measures of success when the SCP undergoes its major review and is re-adopted in 2021.

CONCLUSION

The review of the SCP 2017 has shown that the majority of the SCP strategies are reflective of the community's objectives and are being progressed. It is recommended that amendments are made to the SCP 2017 to respond to the key themes raised during the minor review consultation. The amendments will not alter the overall direction of the plan, but will strengthen the focus of some strategies and objectives.

OPTIONS

Council may choose to not adopt any of the recommendations and leave the SCP 2017 unchanged, or to adopt only some of the recommendations.

TIMELINE FOR IMPLEMENTATION OF OFFICER RECOMMENDATION

Upon adoption, the recommendations will be incorporated into a new publication "Strategic Community Plan 2017 (Review 2019)". The new publication will be posted to the City's website within one month of adoption, with hardcopies published within two months.

The community will be notified of the amendments in the April editions of the *City Connect* pages of the Busselton-Dunsborough Mail (newspaper) and Bay to Bay newsletter.

OFFICER RECOMMENDATION

That the Council adopt the following changes to the Strategic Community Plan 2017:

(i) Objective 1.4

From: Community services and programs that support people of all ages and backgrounds.

To: Work with key partners to provide a range of community services and programs that support people of all ages and backgrounds.

(ii) Strategy 1(a) -

From: Explore ways to improve social connectedness and inclusion.

To: Explore ways to improve social connectedness and inclusion in our community, in particular youth and those who are disadvantaged.

(iii) Strategy 1(b)

From: Engage with providers for the timely delivery of specialist health and other support services that assist all sectors of our community.

To: Advocate for and support providers to deliver specialist, mental health and substance support services

(iv) Strategy 1(c)

From: Work with the community and other key partners to create and maintain safe public areas.

To: Work with the community and other key partners to keep our community safe.

(v) Strategy 2(b)

From: Develop and maintain rural and suburban parks and reserves for the enjoyment of the community.

To: Develop and maintain rural and suburban parks and playgrounds for the enjoyment of the community.

(vi) Strategy 3(c)

From: Work with the community to identify and implement environmental sustainability initiatives

To: Work with the community to implement the City's environment strategy.

(vii) Strategy 3(f)

From: Continue to play a strong role as part of the Vasse Ministerial Taskforce to improve the health of waterways in the Geographe Catchment (including the Lower Vasse River, Toby Inlet and Vasse-Wonnerup wetlands).

To: Continue to work with key partners to improve the health of waterways in the Geographe catchment.

(viii) Strategy 4(c)

From: Develop and implement strategies that attract business investment, diversify the economy and provide a balance between large and small business.

To: Continue to attract and support business investment and diversity in the economy.

(ix) Strategy 4(d)

From: Work with key partners to develop initiatives that support new local business, including the activation of key business nodes.

To: Work with key partners to develop initiatives that support new and existing local businesses.

(x) Objective 5.3

From: Cycle ways that connect our communities and provide alternative transport choices.

To: Pathways and cycle ways that connect our communities and provide alternative transport choices.

(xi) Strategy 5(b)

From: Advocate for improved road infrastructure link to regional centres, including a dual lane road between Busselton and Capel and the Busselton-Bunbury outer bypass road, and Vasse-Dunsborough link.

To: Advocate for improved road infrastructure, in particular a dual land road between Busselton and Capel and a Vasse-Dunsborough link.

(xii) Strategy 6(a)

From: Provide opportunities for the community to participate in decision making processes.

To: Provide opportunities for the community to contribute to decision making processes.

(xiii) Strategy 6(b)

From: Improve two way communication with the community using a range of accessible communication channels.

To: Engage with the community using a range of accessible two way communication channels.

(xiv) Strategy 6(c)

From: Ensure the City's long term financial planning delivers the community goals and aspirations in a sustainable and affordable manner.

To: Deliver long term financial planning that helps to achieve community goals and aspirations in a sustainable and affordable manner.

(xv) Strategy 6(e)

From: Actively participate in regional, state and national alliances to return benefit to the community.

To: Actively participate in regional, state, national and international alliances to return benefit to the community.

17. CHIEF EXECUTIVE OFFICERS REPORT

17.1 COUNCILLORS' INFORMATION BULLETIN

SUBJECT INDEX: Councillors' Information Bulletin

STRATEGIC OBJECTIVE: Governance systems, process and practices are responsible, ethical

and transparent.

BUSINESS UNIT: Governance Services **ACTIVITY UNIT:** Governance Services

REPORTING OFFICER: Administration Officer - Governance - Kate Dudley

AUTHORISING OFFICER: Chief Executive Officer - Mike Archer

VOTING REQUIREMENT: Simple Majority

ATTACHMENTS: Attachment A State Administrative Tribunal Reviews

Attachment B Partnership Agreement

between WALGA and the Public Transport Authority.

PRÉCIS

This report provides an overview of a range of information that is considered appropriate to be formally presented to the Council for its receipt and noting. The information is provided in order to ensure that each Councillor, and the Council, is being kept fully informed, while also acknowledging that these are matters that will also be of interest to the community.

Any matter that is raised in this report as a result of incoming correspondence is to be dealt with as normal business correspondence, but is presented in this bulletin for the information of the Council and the community.

INFORMATION BULLETIN

17.1.1 State Administrative Tribunal Reviews

Attachment A is a list showing the current status of State Administrative Tribunal Reviews involving the City of Busselton.

17.1.2 Partnership Agreement between WALGA and the Public Transport Authority

Attachment B shows the Partnership Agreement between WALGA and the Public Transport Authority.

17.1.3 MAIOC Guide Letter

WALGA MAIOC GUIDE RELEASE

Please find enclosed the Managing Alcohol In Our Communities: A Guide for Local Government (MAIOC Guide). The MAIOC Guide has been developed through a partnership between the Mental Health Commission (MHC), the Public Health Advocacy Institute of Western Australia (PHAIWA) and WALGA.

The MAIOC Guide promotes a whole-of-organisation approach to alcohol management and aims to support existing Local Government activities, responsibilities and processes to address alcohol-related issues within their communities. The information contained in this Guide promotes a prevention and risk management approach to reduce alcohol-related harm and, in turn, create a safe and healthy place for people to work, live and play.

This is a free resource to further assist Local Government in:

- providing services that relate to, or are affected by, alcohol,
- preventing and minimising alcohol problems in their community, and
- promote your area as a safe and healthy place to live, work and play.

WALGA acknowledge and thank the Local Government officers who have been engaged in the development of the MAIOC Guide in preparation for wider dissemination. It is anticipated to be relevant to all spheres of a Local Government and will be of particular interest to Community Development and Environmental Health officers.

17.1.4 Small Business Friendly Approvals Project Letter

Following the launch of the Small Business Friendly Local Governments (SBFLG) initiative in August 2016, there has been a steady increase in the number of local governments making a public commitment to supporting small businesses and developing their local economies.

Across the network of 30 small business friendly local governments, it is encouraging to see the SBFLG Charter being embraced and a broad range of small business initiatives being implemented. As a group, these local governments are home to half of all small businesses in the State, which means this small business commitment is significant and far reaching.

The Small Business Development Corporation (SBDC) has identified an opportunity to build on the work of a number of small business friendly local governments and pilot a new project aimed at streamlining approval processes. This project will be known as the Small Business Friendly Approvals Project and will be commencing in May 2019 for a six month period.

In undertaking this pilot project, the SBDC will work closely with two local governments to map the small business customer journey within the retail and food sectors, and design a number of reforms aimed at improving the associated approval processes. A consultant has been engaged to oversee and deliver the Approvals Project.

At our current level of resourcing for this project our capacity for the pilot is limited to two local governments based in the metropolitan region: the Cities of Canning and Stirling. Factors guiding this selection include the number of small businesses within their boundaries and the size of their local economies which will enable us to demonstrate the scale of economic benefit achievable through well planned and designed reforms.

An important component of the Approvals Project is the development of how-to guides to assist local governments introduce similar reforms within their own organisations. I look forward to sharing this guidance material with you later this year, as well as providing an overview of the lessons learned and opportunities for future projects and partnerships.

OFFICER RECOMMENDATION

That the items from the Councillors' Information Bulletin be noted:

- 17.1.1 State Administrative Tribunal Reviews
- 17.1.2 Partnership Agreement between WALGA and the Public Transport Authority
- 17.1.3 MAIOC Guide Letter
- 17.1.4 Small Business Friendly Approvals Project Letter

175 State Administrative Tribunal Reviews

As at 27 March 2019

AS at Z7 Ware	, 2025								
APPLICATION (Name, No. and City File Reference)	PROPERTY	DATE COMMENCED	DECISION BEING REVIEWED	RESPONSIBLE OFFICER	STAGE COMPLETED	NEXT ACTION AND DATE OF ACTION AS PER SAT ORDERS	DATE COMPLETED / CLOSED		
CITY OF BUSSELTON									
Nil									
JOINT DEVELOPMENT ASSESSMENT PANEL									
Realview Holdings v Presiding Member of the SJDAP	86 West Street, Busselton	February 2019	Appeal against refusal of Development application for Markets	State Solicitors Office / Joanna Wilson	Directions hearing on the 8 March 2019 against the decision of the Southern Joint Development Assessment Panel to refuse the application. Mediation scheduled for 3 April 2019.	Mediation on 3 April, 2019			
WESTERN AUSTR	ALIAN PLANNING	COMMISSION							
Harmanis v Western Australian Planning Commission	Lot 2 Woodlands Road		Appeal against refusal of subdivision application for 3 lots.	State Solicitors Office / Joanna Wilson	Hearings scheduled on 22 – 27 March 2019 against the decision of the WAPC to refuse the application	Hearings on 22-27 March, 2019			

Partnership Agreement between WALGA and the Public Transport Authority:

Defining the Roles and Responsibilities for the Planning, Installation and Maintenance of Bus Stop Infrastructure

2018/19 - 2022/23





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Partnership Agreement / between WALGA and the / Public Transport Authority

1. Preliminaries

The Public Transport Authority (PTA) and Local Governments in Western Australia recognise the importance of public transport in achieving efficient personal mobility and the importance of making public transport an attractive option for West Australians. There are over 13,000 public transport bus stops in Western Australia that must be upgraded to comply with the Disability Standards. This Agreement will assist in ensuring that investments by the PTA and Local Government in bus stop infrastructure deliver good value to the community. This Agreement is made subject to the provisions of the Local Government Act 1995; the Public Transport Act 2003 and the Land Administration Act 1997.

2. Parties to this Agreement

In entering this Partnership Agreement both State and Local Government recognise that they have an interest and role in the provision and improving bus stop infrastructure, and pathways to bus stops for the people of Western Australia.

The signatories to this Partnership Agreement are:

- Public Transport Authority of Western Australia: Managing Director; and
- Local Government: President, Western Australian Local Government Association (WALGA).

3. Definitions

Ancillary Bus Stop Infrastructure means fixtures and fittings which are erected or installed immediately adjacent to Core Bus Stop Infrastructure, including (without limitation) bus shelters, bins, seats and footpaths.

Consultation means seeking and providing information to/from the other party regarding plans that may affect the other party's current or proposed infrastructure; for each party to have regard for advice provided and offer feedback concerning the final decision.

Core Bus Stop Infrastructure means a bus stop pole, a level concrete hard-stand passenger boarding area at correct kerb height, tactile ground surface indicators and up

Attachment B

Partnership Agreement / between WALGA and the / Public Transport Authority

4. Preamble

This Partnership Agreement provides the general framework through which the planning, installation and maintenance of bus stop infrastructure on Road Reserves will operate throughout Western Australia. The Partnership Agreement is based on negotiations and discussions between the parties and the general template for State/Local Government Partnership Agreements. This Agreement applies to Local Governments with regular public transport SmartRider ticketed services operating in its boundaries.

This Partnership Agreement is predicated on PTA and Local Governments mutual understanding of their legislated functions and histories of collaboration (including financial collaboration) with respect to bus stop infrastructure in the Road Reserve.

4.1. Road Reserve

Responsibility for assets and infrastructure located in the Road Reserve is complicated in nature making the issue of responsibility for bus stop infrastructure similarly complicated. Most suburban bus stops are located in the Road Reserve which is provided under Section 55 (1)(a) of the Land Administration Act 1997.

Under section 16 of the *Main Roads Act 1930*, the Commissioner of Main Roads is responsible for care, control and management of land over which a main road or highway is declared (that is the area incorporating the Road Reserve).

Under Sections 3.53(2) and 3.1 of the *Local Government Act 1995*, the relevant Local Government is responsible for controlling and managing roads that do not fall within the control of the Commissioner of Main Roads (that is all other roads).

Complicating the circumstance is the fact that various Government Agencies access the Road Reserve for the purpose of providing services for the benefit of the whole community. Common examples include infrastructure required for the provision of water, electricity, gas and telecommunications where the entity installing the infrastructure in the Road Reserve is responsible for its ongoing maintenance. Similarly, for any bus stop infrastructure located in the Road

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5. Principles

The following principles will be achieved through open and honest consultation, engagement, communication, participation, cooperation and collaboration between the parties at both the strategic and operational levels.

All parties are committed to a partnership approach in delivering Disability Standardscompliant bus stop infrastructure that connects with the local footpath network wherever possible.

The parties recognise that a partnership approach between State and Local Government:

- is essential for the continued delivery of Core Bus Stop Infrastructure and Ancillary Bus Stop Infrastructure for the Western Australian community;
- will provide a high level operational framework for the parties to follow; and
- will be sensitive and responsive to the functions, needs and constraints of both spheres of government.

The parties involved will:

- identify and understand the roles and responsibilities of both spheres of government within this Partnership Agreement;
- ensure that these roles are considered and respected in the decision making process;
- commit to open and timely communication on all aspects of this Partnership Agreement;
- undertake purposeful consultation at mutually agreed stages to facilitate understanding and agreement;
- recognise that new partnership agreements can be initiated by either State or Local Government;
- promote a realistic approach to funding and resource issues;
- utilise a transparent approach where changes to roles, responsibilities and budgets are negotiated and agreed and resources necessary to implement changes are identified; and
- adopt clearly defined reporting, dispute resolution and review mechanisms.

Partnership Agreement / between WALGA and the / Public Transport Authority

Further details and typical bus stop design scenarios are detailed in Schedule 1 – PTA Bus Stop Design Guidelines.

6.2. Bus Shelter Subsidy Program

The Bus Shelter Subsidy Program (BSSP) is administered by the PTA and provides funding in approved circumstances for Local Governments (and other entities) for the purpose of installing bus shelters.

Annual funding for the BSSP is currently limited to \$500,000 per annum and applications are considered by the PTA on an ongoing basis using criteria detailed in Schedule 2. The allocation of BSSP funds is a transparent process and a list of project applications and approvals will be maintained by the PTA and be made available to WALGA annually.

Under the BSSP, the PTA typically takes responsibility for undertaking all physical works to install bus shelters and Local Governments are responsible for undertaking any required community consultation before work proceeds. In limited circumstances (typically for bus shelters located in regional areas), it may be more practical for Local Governments to purchase and install a bus shelter. In this circumstance, the PTA may agree to provide an equivalent amount of BSSP funding for this purpose.

The PTA maintains a bus shelter panel contract arrangement that provides a suite of standard bus shelter designs that can be selected by Local Governments under the BSSP. Local Governments seeking funding support under the BSSP are required to use only those bus shelter designs available through the PTA's panel contract to prevent the proliferation of different bus shelter designs across the State. The PTA regularly reviews its panel contract arrangements for the purpose of ensuring a reasonable suite of bus shelter options are available at competitive prices.

Under BSSP funding arrangements, the relevant Local Government must pay to the PTA the required financial contribution and accept ownership and ongoing maintenance responsibility of the bus shelter. The PTA will construct a compliant passenger boarding area and contribute 50% of the supply and installation cost of a bus shelter to a maximum amount of \$7,000 (i.e. total bus shelter cost of \$14,000).

BSMAS. Bus shelters provided to Local Governments under Infrastructure Commercial Agreements will be excluded from receipt of BSMAS payments. Local Governments must keep accurate and up to date data on all bus shelters provided under these arrangements and to make this information available to the PTA in a timely manner upon its reasonable request.

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In consultation with WALGA, the PTA will undertake an annual review of the BSMAS rates taking into consideration; the number of eligible shelters and the overall fairness/equity of the BSMAS payment arrangements to the participants.

The PTA will make BSMAS payments annually in March. Payment will only be made to formal participants in the scheme and funds are not able to be carried forward to future financial years. To qualify, each Local Government must follow the spirit and intent of this Partnership Agreement and complete the "Participation Agreement" detailed in Schedule 4 on an annual basis.

7. Roles and responsibilities

7.1. General

The PTA is responsible for the planning and delivery of public bus services for the benefit of the local community which includes; selection of bus routes, setting of service frequencies, selection of bus stop locations and the operation of bus services. Local Government is responsible for the care and maintenance of its assets located within Road Reserve for the benefit of the local community. Whilst each party will remain ultimately responsible for the delivery and performance of its responsibilities, both parties agree to work collaboratively with the stated aim of minimising resultant issues for the other party as a consequence of any decisions made.

7.2. Core Bus Stop Infrastructure

The PTA is responsible for:

- ensuring bus stops are positioned in the Road Reserve in safe locations for pedestrians and road users in compliance with the Road Traffic Code 2000;
- ensuring bus stops are positioned at locations that best serve the public transport needs of the community;

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7.5. Responsibilities for compliance to Disability Standards

All Core Bus Stop Infrastructure and Ancillary Bus Stop Infrastructure installed or constructed by Local Government or the PTA, must eventually be compliant to the requirements of the Disability Standards and the PTA Bus Stop Site Design Guidelines as detailed in Schedule 1. The PTA is responsible for ensuring that public bus stops comply with the requirements of the Disability Standards and Local Government should consult with the PTA to ensure this is achieved before proceeding with any planned works (including Infrastructure Commercial Agreement arrangements) that may render a compliant bus stop non-compliant. Simple repositioning/replacement of existing or the installation of new Ancillary Bus Stop Infrastructure can have unintended consequences by blocking required access ways/clearances and render a compliant bus stop non-compliant to the Disability Standards which will need to be rectified.

8. Adding, removing, upgrading or modifying bus stop infrastructure

8.1. New Core Bus Stop Infrastructure

- (i) Before creating a new bus stop for a new or existing bus route and installing Core Bus Stop Infrastructure in the Road Reserve the PTA will consult with officers of the relevant Local Government to confirm the suitability of planned bus stop locations and invite comment for its consideration. The purpose of this consultation is to determine the suitability of each proposed stop location from a functional/operational perspective; this information is specifically not provided for the purpose of Local Government undertaking public consultation with nearby households, or for dissemination to elected members or officials that may attempt to exercise undue influence over the result the PTA's decision making process for selecting bus stop locations is strictly limited to functional and operational matters and will not be influenced by extraneous issues. The PTA will, wherever possible, aim to produce mutually acceptable outcomes and provide feedback to Local Governments about its decisions if required.
- (ii) Before introducing a new bus route (that will ultimately require new bus stops as outlined above), the PTA typically undertakes a community consultation process, where Transperth patrons and relevant entities like Local

8.3. Local Government works/approvals near Core Bus Stop Infrastructure

- (i) Local Government should consult with the PTA before undertaking any works or approvals near a bus stop which may impact on the functionality or safety of a bus stop location. Installations of additional traffic lanes, turn-pockets, roundabouts, pram ramps, pedestrian refuges, new or replacement kerbing, road resurfacing, pedestrian crossings, crossovers, property development approvals, new footpaths or footpath upgrades can adversely impact upon the functionality or safety of nearby bus stop locations on a temporary or permanent basis.
- (ii) If the works or approvals of a Local Government renders a nearby compliant bus stop non-compliant or unusable for bus operations, it will be responsible for resolving the issue, or for reimbursing the PTA's reasonable cost of resolving the issue (which may include the cost of installing a new permanent or temporary bus stop at an alternative location if the original site is rendered unusable). Local Governments should consult with the PTA to ensure that any proposed works near a bus stop will not adversely impact upon it and the PTA commits to achieving mutually acceptable solutions.

8.4. New Ancillary Bus Stop Infrastructure

- (i) New Ancillary Bus Stop Infrastructure or other incidental infrastructure installed by Local Governments (including bus shelters, seats and bins or any infrastructure provided under Infrastructure Commercial Agreements) can inadvertently render a compliant bus stop non-compliant. Before proceeding with the installation of any infrastructure or footpath modifications at or near to a bus stop (which may then become Ancillary Bus Stop Infrastructure or Core Bus Stop Infrastructure), the relevant Local Government should consult with the PTA to ensure the planned works do not adversely impact upon a bus stops compliance to the Disability Standards.
- (ii) When the PTA becomes aware of Ancillary Bus Stop Infrastructure obstructing the bus stop area and making it non-compliant, it will consult with the relevant Local Government with the intent of modifying the positioning or removing the Ancillary Bus Stop Infrastructure so that compliance can be restored as a matter of priority.

8.6. Planning for bus stop removals

(i) Before making the decision to cancel or significantly modify an existing bus route which may result in existing bus stops being moved or deleted, the PTA typically undertakes a community consultation process and relevant entities such as affected Local Governments will be invited to make comment for its consideration. The PTA commits to taking into consideration issues raised by all participants, including affected Local Governments and, wherever possible, producing mutually acceptable outcomes.

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(ii) Local Government decisions restricting road utilisation, such as alterations to traffic flows or introduction of traffic calming measures can adversely impact on bus operations and the utility of existing bus stop infrastructure resulting in the need to remove a bus stop or change a bus route. Where a decision of Local Government could possibly render existing bus stops unusable and therefore require removal, the relevant Local Government should consult with the PTA to determine alternative solutions or the likely cost implication to the PTA of making this decision (which may ultimately be borne by that Local Government).

8.7. Cost implications of changes to bus routes and bus stop locations

As a general principle, it is agreed that whichever party makes a change (to the bus route or the road) which subsequently requires a bus stop to be moved then the party (PTA or Local Government) causing the change will be responsible for the resultant reasonable additional bus stop infrastructure costs incurred by the other party. In all bus stop relocation circumstances, both parties commit to working in partnership with each other to minimise the cost implications for the party meeting the costs.

8.7.1. Cost implications for bus stop changes caused by Local Government

If the affected bus stop(s) has not been upgraded to Disability Standards, the PTA's cost of removing Core Bus Stop Infrastructure is typically minimal and it will likely move the bus stop at no cost to Local Government as part of its normal operations, subject to PTA review and acceptance of the proposed location. However, where a bus stop has been upgraded by the PTA to Disability Standards and/or there is PTA owned Ancillary Bus Stop

8.8. Utility provider works impacting bus stop infrastructure

If a Local Government becomes aware of any utility works that will likely, or will, adversely impact upon a bus stop, the PTA should be advised as soon as practicable. Following Local Government advice of utility works, the PTA will liaise directly with the relevant utility regarding impacts upon bus stop locations.

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9. Maintenance of bus stop infrastructure

9.1. Maintenance of Core Bus Stop Infrastructure

The PTA is responsible for maintaining and updating all of its Core Bus Stop Infrastructure to standards required by State Government. Any maintenance issues identified by Local Governments for Core Bus Stop Infrastructure should be reported to the PTA as soon as reasonably practicable for resolution by the PTA.

9.2. Maintenance of Ancillary Bus Stop Infrastructure

Maintenance of Ancillary Bus Stop Infrastructure provided by Local Government is the responsibility of the relevant Local Government. In recognition of the benefit derived by its patrons from the provision of bus shelters by Local Government, the PTA agrees to provide funding support to participating Local Governments under the "Bus Shelter Maintenance Assistance Scheme" (BSMAS) described in section 6.3 and detailed in Schedule 4.

Maintenance of Ancillary Bus Stop Infrastructure provided by the PTA is the responsibility of the PTA.

9.3. Bus Shelter Database

The PTA will maintain the primary bus stop and bus shelter database used to make BSMAS payments. WALGA/Local Governments agree to provide the PTA with updated/revised bus shelter information on a regular basis; but no less than annually, so that the accuracy of PTA's database is maintained. In undertaking its duties, if the PTA becomes aware of discrepancies in the bus shelter database it will consult directly with the relevant Local Government to clarify and update the

Partnership Agreement / between WALGA and the / Public Transport Authority

10.4. Application of GST

- (i.) All monetary references in this Partnership Agreement are exclusive of GST.
- (ii.) Any monetary remittance by PTA to a Local Government under the BSMAS or BSSP will include GST.

10.5. Agreement in good faith

This is an agreement made in good faith based on the commitment of the parties to an effective and sustainable partnership. It does not seek to establish a legal relationship between the parties.

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1. Schedule 1

PTA Bus Stop Design Guidelines

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1.6	Rubbish Bins and Seats	3
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- Small InfoUnit 236mm x 45mm aluminium extrusion, installed 1450mm above ground level.
 Also features route and direction of travel information.
- InfoCube Cube version of the Narrow InfoUnit. Typically used in the Perth CBD, at Transperth stations and at selected bus stop locations where there is significant passenger movement.
- Perth CAT Modules Only used at bus stops serviced by the Perth CAT bus routes.

The InfoUnit and InfoCube type bus stop signs are only installed at locations approved by the PTA and typically must satisfy a minimum number of daily passenger boardings/alightings or shall be located near to major attractors such as a shopping centres or aged care facility.

Where timetable information is displayed it will be placed on the approach side of the sign.

Bus stop signs or posts must be installed into a concrete surface within the boarding area as detailed in the approved design.

Where a bus stop is located within a bus embayment, the bus stop sign or post is to be placed 4 to 6 metres from the end of the embayment to the satisfaction of the PTA. This enables a bus driver to re-enter traffic more easily without slowing following traffic more than necessary.

1.4. Bus Stop Boarding Area - Construction Details

The boarding area at bus stops are to be constructed in accordance with PTA-approved designs only. If a design is being produced by a party other than PTA it must be provided to the PTA for approval on the PTA drawing template and must comply with the standards and guidelines detailed in this document.

The general requirements for bus stop boarding areas are as follows:

- The size of the boarding area for a bus stop location will be determined by the PTA but as a minimum shall be 3.5m wide x 2.5m deep.
- The entire boarding area (including the tactile ground surface indicators) must be considered
 an exclusion zone where no infrastructure (eg. Rubbish bin, seat, street light, planting,
 artwork etc.) can be installed (unless otherwise approved by the PTA) as it will obstruct the
 required manoeuvring area.
- The manoeuvring area for a wheelchair or other mobility aide must comply with AS 1428.2 (1992), clause 6.2. The minimum space required to allow a 180° turn is 2070mm in the direction of travel and a minimum width of not less than 1540mm. This manoeuvring area should not overlap the area required to deploy a bus ramp.
- The gradient of the boarding area shall be no steeper than 1:40 (2.5%) in any direction unless
 it is determined and accepted by the PTA that it is not practicable due to issues such as
 sloping topography.
- The finished boarding area surface is to be brushed/broom finished as this has been determined to provide a longer term better finish with less chance of future trip hazards.
- The concrete for the boarding area shall be a premix concrete that complies with all relevant Australian Standards (including but not limited to AS 1379). All concrete used in the work shall develop a minimum compressive strength of 25MPa at 28 days.

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If after a reasonable time (2 weeks) the item has not been removed or relocated, the PTA will arrange for this to occur. All costs for this to occur will be recouped from the relevant LGA.

1.7. Rubbish Bin and Seat Installation

Rubbish bins or seats must not be positioned where they obstruct the required manoeuvring area for wheelchairs, prams or people with a mobility issue.

Rubbish bins or seats must not be positioned to obstruct the through path of travel either behind or in front of a bus stop boarding area.

Where it is proposed to install a rubbish bin or seat at a bus stop in the first instance the PTA should be contacted to establish if the bus stop location selected is compliant to the Disability Standards or is planned to be upgraded in the near future.

Where a bus stop is compliant in most cases the PTA can provide a detailed drawing of the bus stop boarding area. The Local Government Authority is required to note on this drawing the proposed location of the rubbish bin or seat and forward to the PTA for its approval.

Where a rubbish bin or seat is already in position at a bus stop to be upgraded they will be considered in the design that will be produced. In this instance in the future if an item has to be replaced the location is established.

This ancillary infrastructure remains the property of Local Government but must comply with the Disability Standards.

1.8. Kerb Design

The PTA's required kerb height for the length of the boarding area is a minimum of 170 mm above the finished road surface to the top of the kerb. This is required to accommodate the different bus types in the Transperth bus fleet and also future proofs against road resurfacing.

A barrier kerb, unless otherwise agreed, flush with the adjoining surface of the boarding area is preferred.

1.9. Tactile Ground Surface Indicators (TGSI's)

As the sole Authority responsible for the boarding area at bus stops, which includes Tactile Ground Surface Indicators (TGSI's), the PTA has a preferred product type that is supplied and installed through an existing contract with its Signage Supply Contractor.

- The preferred product type will be supplied and installed by the PTA contractor (at PTA cost) unless otherwise agreed and approved by the PTA at the design stage prior to works commencing.
- The surface colour of all TGSI's, whether they be the PTA preferred product type or another
 product approved by the PTA at the design stage (see below for further details), must have
 30% luminance contrast to the surface to which they are to be applied.

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1.12. Bus Embayments

The justification for a bus embayment at a particular bus stop location shall be determined by the PTA in consultation with either the relevant Local Government Authority or Main Roads WA, dependent on which party manages that particular road.

The PTA will typically only support the use of bus embayments in the following circumstances:

- · Roads with a speed limit of 80kmh or above,
- Timed bus stops where buses running early are contractually required to dwell or risk receiving a fine from the PTA. Timed bus stops are typically identified by a bulls eye symbol displayed on the bus stop sign/post.
- At bus stop locations that have been identified as having significant passenger loading, such as shopping centres and secondary schools.

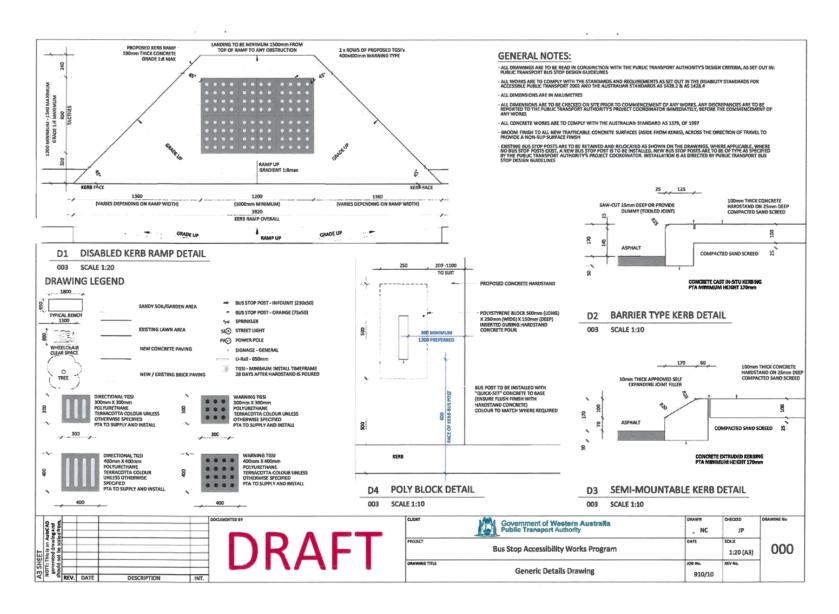
1.13. Bus Embayment Construction

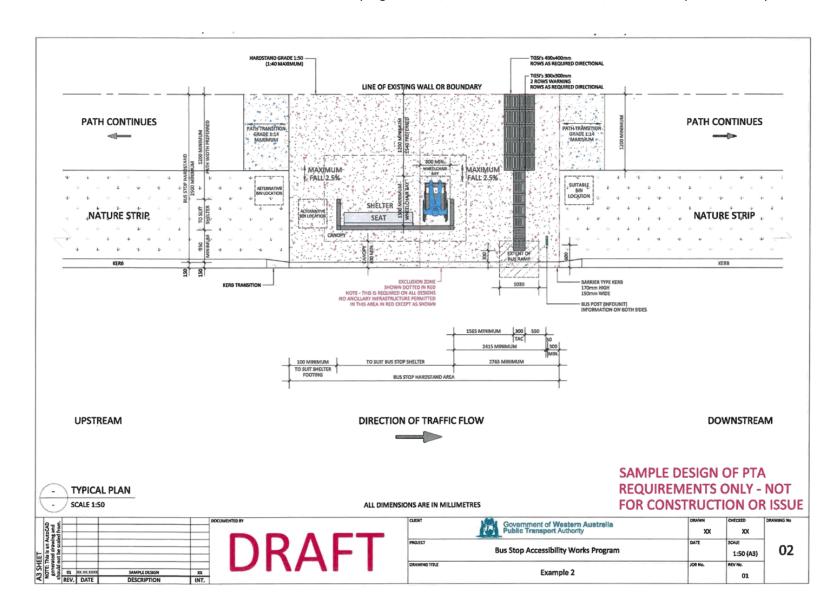
The primary objective is to produce a bus embayment design that provides easy and safe entry/exit travel paths, while achieving bus storage capacity as required for a particular location and to accommodate the specific bus types (rigid/articulated) and a boarding area in accordance with the standards and guidelines detailed in this document.

The minimum width of a bus embayment shall be 3 metres and are to be designed and constructed in accordance with Main Roads WA guidelines. Refer to the Main Roads WA website for further details. The critical factor is the requirement for buses to be able to stop parallel to the kerb at the designated boarding point.

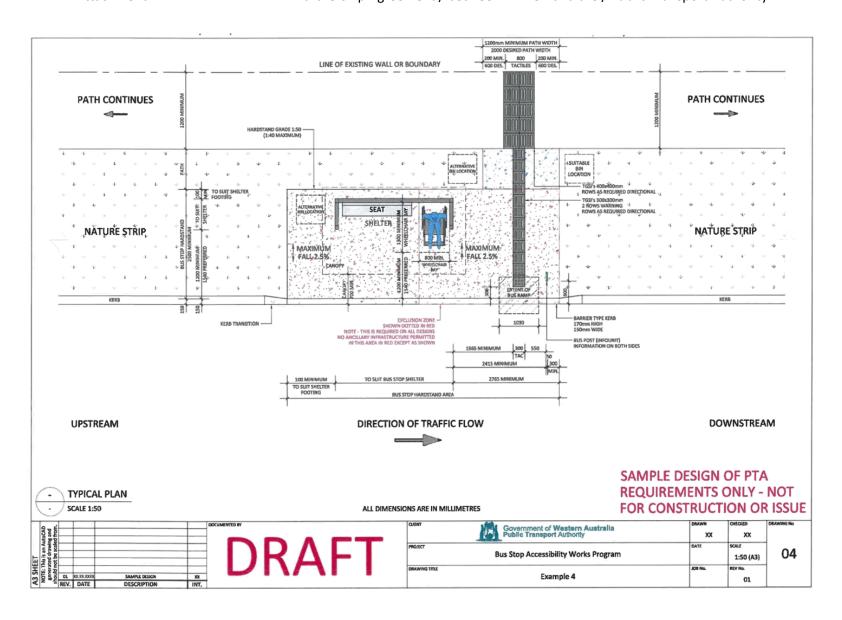
When designing a bus embayment some of the issues that are to be considered includes: passenger and bus driver comfort and safety, adjacent pedestrian movement, the impact on underground services, drainage and maintenance and environmental factors.

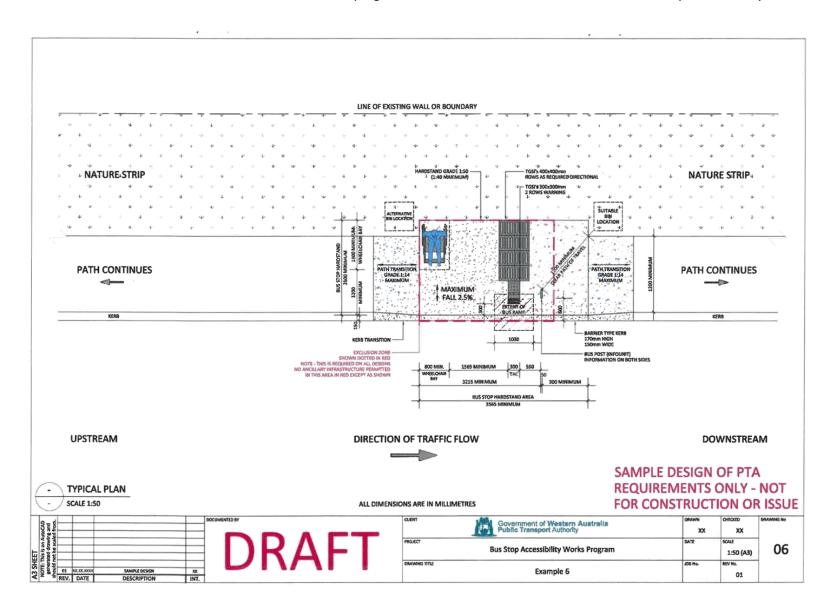
All construction work must comply with all relevant Australian Standards and guidelines.

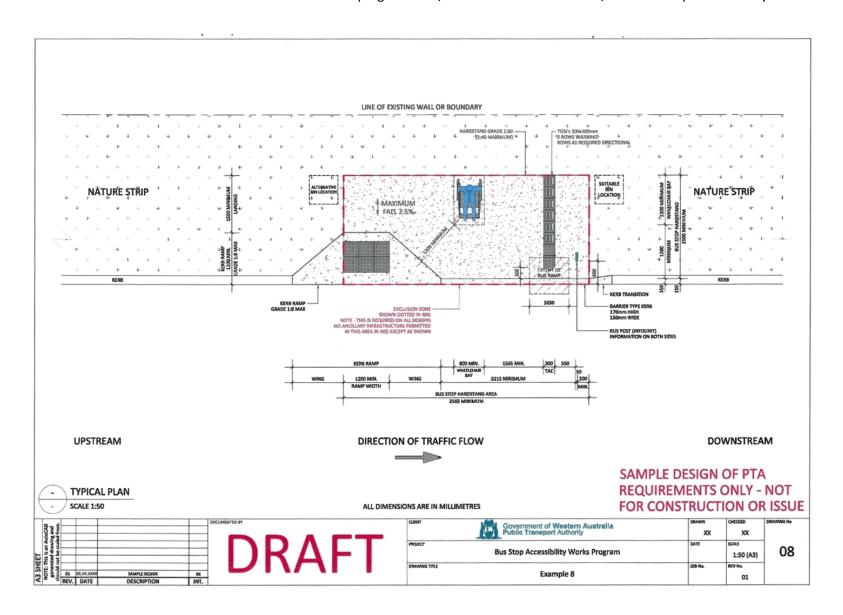


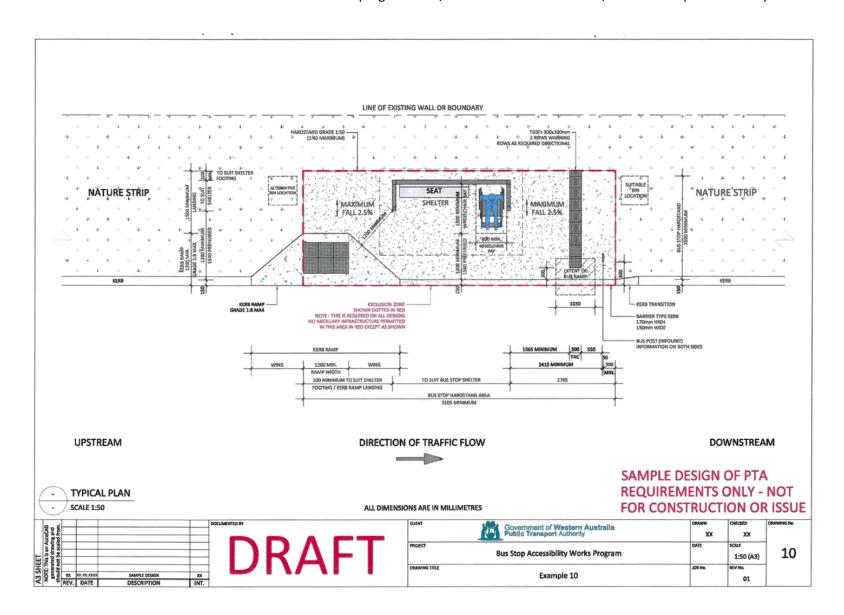


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- if funding for the program is exhausted for the current financial year applications
 may be automatically carried forward to the next financial year (if the applicant is
 agreeable).
- if a single Local Government submits an excessively high number of applications –
 the PTA will scale-back the number of applications it will approve in that year.
- if a Local Government has demonstrated a strong commitment to funding the
 provision of Ancillary Bus Stop Infrastructure (particularly non-qualifying BSSP bus
 shelters) the passenger boarding requirement under criterion1 may be reduced (if
 BSSP funding is available).
- special case applications (universities, health campuses, shopping centres) the
 passenger boarding requirement under criterion 1 may be reduced (if BSSP funding
 is available).

Submissions are to be sent to transperthsignage@pta.wa.gov.au, or call 9326 2922 for assistance.

Stop Number	Location	Suburb	CAT Stop Name	CAT Number	CAT Route
16916	Hay Street	West Perth	Parliament	15	Red
17511	Outram St	West Perth	Outram Street	18	Red
17509	Ord St	West Perth	Ord Street	19	Red
17510	Ord St	West Perth	Havelock Street	20	Red
17497	Murray St	West Perth	Gordon Street	21	Red
16968	Murray St	Perth	Royal Perth Hospital	26	Red
16969	Goderich St	Perth	Mercedes College	27	Red
16937	Hay St	East Perth	Queens Gardens	29	Red
16974	Barrack Sq	Perth	Barrack Square *temporary	2	Blue
12130	Beaufort St	Perth	Museum	5	Blue
12936	Aberdeen St	Perth	Art Centre	6	Blue
12937	Aberdeen St	Perth	Central Institute	7	Blue
12938	Aberdeen St	Northbridge	Aberdeen Street	8	Blue
12939	Aberdeen St	Northbridge	Francis Street	9	Blue
12935	James St	Northbridge	James Street	12	Blue
26650	Colin St	West Perth	Ord Street	6	Green
26652	Colin St	West Perth	Hay Street	7	Green
26656	Leederville Stn - Access Rd	West Leederville	Leederville Station	11	Green
26653	Colin St	West Perth	Hay Street	15	Green
26651	Colin St	West Perth	Kings Park Road	16	Green
10117	St Georges Tce	Perth	Cloisters	20	Green
12915	5 Wellington St	East Perth	Wellington	4	Red /
17312		cast Perth	Square	9	Yellow
12924	Wellington St	Perth	Forrest Place	10	Red /
12924				14	Yellow
12901	Wellington St	Perth	Perth Station	24	Red /
12301	Wellington St	reitti	reitii Station	25	Yellow

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	Applica	tion No	Receipt No	i i
Busselton	CIO ID			City o
	2.5 MAR 2019		f Buss	
City of	Prope	rty ID	Doc ID	sselt
Ö	Reter	ntion		- 3



19 March 2019

Our Ref: 05-001-03-0037/MM:ID

Mr Mike Archer Chief Executive Officer City of Busselton Locked Bag 1 BUSSELTON WA 6280

Dear Mike

BUS STOP INFRASTRUCTURE PARTNERSHIP AGREEMENT 2018/19 - 2022/23

A new, five year Bus Stop Infrastructure Partnership Agreement with the Public Transport Authority (PTA) was endorsed by the WALGA State Council in December 2018 and has now been signed by the parties. A copy of the Agreement is enclosed for your reference and an electronic copy can be found on the WALGA website (https://walga.asn.au/Policy-Advice-and-Advocacy/Infrastructure/Urban-and-Regional-Transport/Bus-Stop-Infrastructure-Partnership-Agreement).

The new Agreement supersedes the 2015 Bus Stop Infrastructure Partnership Agreement for Perth and Peel that was varied in 2016 to include regional Local Governments with SmartRiderticketed regular public transport services. During 2018 WALGA and the PTA reviewed the Agreement. Feedback from Local Governments indicated the Agreement was valuable in its current form with only minor amendments required.

The Agreement defines the roles and responsibilities for providing and maintaining bus stop infrastructure. It is intended to assist in ensuring that investments in bus stop infrastructure by the PTA and Local Government deliver maximum benefit to the community. In particular, the Agreement outlines the communication required between the PTA and Local Governments before works commence at or around bus stops. The Agreement also details the responsibilities of each party when bus stop infrastructure is upgraded, removed or relocated. The PTA has continued its commitment to provide maintenance funding for bus shelters to Local Governments through the Bus Shelter Maintenance Assistance Scheme (BSMAS). Total funding for the BSMAS is \$500,000 per annum. Bus shelters provided to Local Governments under commercial agreements are excluded from this funding. The PTA will contact Local Governments annually regarding the BSMAS payment claims.

The Agreement also includes the Bus Shelter Subsidy Program (BSSP), which is administered by the PTA and provides funding, subject to meeting criteria, to Local Governments for installing bus shelters. Funding for the BSSP is currently \$500,000 per annum. The Agreement introduces a maximum funding contribution from the PTA of \$7,000 per shelter. The rationale for the funding cap per shelter is to improve equity in the distribution of funding between Local Governments.



For more information regarding the Agreement please contact Policy Officer - Transport and Roads, Marissa MacDonald on 9213 2050 or email mmacdonald@walga.asn.au.

Pours sincerely

Wayne Scheggia A/Chief Executive Officer

Enclosure

CC Mr Ian Vinicombe Contract Manager Transperth Bus Services Public Transport Authority

- 18. MOTIONS OF WHICH PREVIOUS NOTICE HAS BEEN GIVEN
- 19. <u>URGENT BUSINESS</u>
- 20. CONFIDENTIAL MATTERS
- 21. CLOSURE