

Council Reference: GT1/52 and GT1/51
Your Reference: MP06_0316 and MP06_0318

2 February 2010

Department of Planning
Major Project Assessments
GPO Box 39
SYDNEY NSW 2001

Attention: Alan Bright

Dear Sir

**Comments on the Development Code - Major Projects at Cobaki
Lakes and Kings Forest - Council Submission**

Reference is made to the abovementioned Major Projects (MP06_0316 - residential community development at Cobaki Lakes and MP06_0318 at Kings Forest) and the associated Development Codes which have been or are currently on public exhibition.

Council has reviewed the development codes and provide the following submission.
Note: Given that the codes are almost identical, comments below relate to both codes unless otherwise specified.

PLANNING

Detailed comments are provided below.

Sequencing

No out of sequence development should be allowed. Section 1.2 and Part 5 of the codes need to ensure that development is undertaken in sequence, according to consecutive release areas indicated on a plan. Note that the sequencing plan should include the sequence of infrastructure provision, open space and proposed lakes, coordinated with residential and commercial release.

Employment Node

As stated in previous submissions, the objective and vision of the codes should provide for employment opportunities (other than retail uses in the town centre) for future residents.

Density Trading Between Precincts

Both codes identify that trading can occur between precincts. This is a concern as there is no indication of how trading between precincts will be monitored. How will complying development be tracked and tallied? Will trading only be achievable through a modification to the Concept Plan? How is trading possible when targets have not been set for each precinct?

Implementation of Future Development - Process

Primarily, it is considered that:

1. The application of the codes for both Kings Forest and Cobaki Lakes should be limited to only new types of small lot housing, currently not catered for in Council's DCP.
2. That the codes, specifically sections 1.5 (Structure of this Plan) and 1.6 (How to Use this Code) be embellished to clarify the process for making an application for subdivision and the process for developing buildings, in accordance with the process below.
3. A review clause is required, which require the Council and the Department of Planning (DOP) to review each code after twelve months from adoption and thereafter every two years. And, that the developer, Council or DOP may call for a review as required at earlier intervals. The review clause should specify which agency is responsible for monitoring and assessing proposed modifications to the codes. Any future review should be approved in consultation with Council.

PROCESS FOR DEVELOPING BUILDINGS:

This section needs to be broken down into two parts, one for complying development and one for all other development (that is not exempt or complying) requiring consent from Council.

Complying buildings:

Step 1 needs to identify what will happen if a defined land use is not permissible under the Tweed Local Environmental Plan (TLEP) but consistent with the matrix (ie. Residential Facilities (major)). Will the matrix over-ride the TLEP in this instance?

Step 3 should clarify that the Design Review Panel (DRP) Pre-Approval Certificate must certify that the proposal is in accordance with the Design Guidelines adopted for the Plan of Development and the code. Refer additional comments on the DRP below.

All proponents for complying development should be required to provide the relevant Plan of Development (POD) and Design Guidelines to the Private Certifier and the DRP.

It is recommended that this section clearly state that complying development must only be complying if nominated on a lot, if it is complying with the nominated lot specifications and yield and if it is compliant with Part A of the code.

Development of Buildings that are not Exempt or Complying

Development of buildings that are not exempt or complying includes: townhouses, villas, apartments, subdivision, retirement communities and all other housing types that do not

meet the complying controls (including sohos, terraces, zero lot housing, traditional small lot detached housing, plexes and mews).

A new section for non-complying buildings should be included, specifying that an application is required where the development is not complying (on a nominated lot) or cannot meet the complying controls. It should also specify the relevant instruments in assessment.

It is considered that all townhouses, villas, apartments, shoptops, duplexes (on lots greater than 900m² that is not complying or exempt), and retirement communities should be assessed against Council's DCP Section A1 – Residential and Tourist Development Code (referred to as A1) and not the Kings Forest or Cobaki Lakes Development Codes. The reasoning for this is discussed further below.

The code should also state that all other buildings (traditional detached housing and duplexes on lots less than 450m², soho, Terrace dwellings, zero-lot dwellings, traditional detached dwellings, plexes and mews which do not meet the complying controls) will be subject to assessment against Part B of the Development Code. These controls will be necessary to implement new housing types introduced in the Tweed.

All development applications should be accompanied by a copy of the relevant Plan of Development (POD) and Design Guidelines to the Private Certifier and the Design Review Panel.

Design Review Panel and Pre-Approval Certificate

The code requires that complying development requires a Pre-Approval Certificate, issued by a Design Review Panel (DRP). The codes need to state that the DRP Pre-Approval Certificate certifies that development is in accordance with the Design Guidelines.

The codes are unclear on whether a DRP Pre-Approval Certificate is required for development that is not exempt or complying. Council officers are of the view that it is not necessary if a development application is required.

Council is supportive of the DRP initiative however to ensure quality of outcomes, the following changes are recommended:

- All members must be an architect.
- There should not be less than two people on the panel.
- Members should only be selected from a list of service providers (approved by both Council and the Department of Planning).
- The DRP process should be reviewed and monitored by the DOP in conjunction with Council after twelve months and thereafter every two years to ensure quality control. Thus, key performance indicators and measures should be established for monitoring performance of the DRP.
- A code of conduct should be developed for DRP panel members.

- The controls for the DRP should clearly state that their role is to assess complying development against the code and the Design Guidelines and only where compliance is demonstrated, provide a pre-approval certificate.
- There is concern with compliance – how will poor quality outcomes and misconduct from members of the DRP be managed?

PROCESS FOR DEVELOPING SUBDIVISION:

The Code needs to articulate a process for development of subdivision, stating that:

- All subdivision applications will require a consent under Part 4 of the Act and or as specified by the Minister's approval.
- A Plan of Development (POD) is required for all subdivision.
- The POD needs to identify nominated lots (for complying development: SOHO, Terrace, zero lot, traditional detached dwellings, plex and mews).
- The POD needs to identify Development Lots for townhouses, villas, apartments, retirement communities, commercial / retail lots and Shoptop housing.
- A subsequent POD may be provided for Development Lots if further subdivision is contemplated.
- A POD needs to include Design Guidelines specific to the precinct, proposed lots and type of dwellings proposed.
- Design guidelines need to be referenced on the Section 88B instrument.

It is recommended that this process is depicted diagrammatically for easier interpretation.

Nominated Lot Provisions

Section 5.3 identifies requirements for nominated lots, to allow complying development. It states that traditional detached, zero-lot, terrace, soho, plex, mews and shop top housing are to be nominated on the Plan of Development (POD).

It is not considered appropriate for shoptop housing to be nominated on a nominated lot as according to the codes, they cannot be undertaken as complying development. Shoptop housing and commercial / retail lots in the town and neighbourhood centre should be nominated in Development Lots, along with townhouses, villas, apartments and retirement communities. (Development lots are typically larger lots requiring further planning and development approvals).

Plan of Development and Design Guidelines

The objectives for Design Guidelines state that they allow for interpretation of codes in relation to new trends (etc.). This is not considered appropriate given the codes may be amended (refer comments above on a review clause).

The codes should state that the Design Guidelines provide specific guidelines in relation to the subject precinct and they should also be consistent with the objectives of the code, to avoid conflicting objectives and difficulties in assessment.

It is unclear in what circumstances Design Guidelines are required. It should be stated in the relevant controls that Design Guidelines are required for all precincts.

The controls for Design Guidelines should also state that for Town and Neighbourhood Centre development, Design Guidelines comply with objectives and controls in section 4.

It is unclear what level of detail will be required for the Plan of Development to adequately demonstrate that a site is suitable for a plex or mews proposal (or other small lot housing).

Relationship with other Instruments including the Council's DCP

The codes state that the SEPP (Major Development) and SEPP (Infrastructure) will continue to apply to Cobaki Lakes and Kings Forest. However, this means that any proposed subdivision over 100 lots would be a Part 3A proposal, clarification is requested on this, is this the Departments intention?

In addition, granny flats and retirement communities are addressed in the code, clarification is required as to whether the code will therefore over-ride the provisions of the SEPP (Affordable Rental Housing), SEPP (Seniors Living) and SEPP 65 – Design Quality of Residential Flat Buildings.

There is concern about how the codes will lawfully override the SEPP (Exempt and Complying Development). Refer additional comments below on exempt and complying development.

The code makes no mention of Section B7 (Cobaki Lakes) of Council's DCP. Clarification is required as to whether it is proposed to make B7 redundant.

Exempt and Complying Development Controls

The codes allow for greater types of development to be exempt and complying development (compared with the SEPP (Exempt and Complying Development)). This approach is consistent with trends in State (and national) planning practice to reduce the number of minor applications in Council so that energies can be focused on assessing more complex, critical applications.

The codes include controls for exempt and complying development, including significant variations to the SEPP (Exempt and Complying) Code, outlined in the table below. The

variations listed in the table below are not supported as there is no justification provided and no reason provided for inconsistency with the SEPP.

Development Codes	SEPP
Exempt	
Retaining walls and earthworks are allowed within 6 metres of a waterbody	Retaining walls and earthworks are allowed only within 50 metres of a waterbody.
Events on Council Administered Land are addressed in the codes, requiring that they are undertaken in accordance with Council's Policy.	Not addressed.
Underground Telecommunication Facilities are allowed within a trench 450, however ASS is not addressed.	This is not covered in the SEPP.
Complying Development	
Constrained land such as flooding, bushfire and ASS soils are not excluded from being complying development.	The SEPP excludes constrained land from being complying (for the purpose of the housing code).
Building height of dwellings up to the eave is 3.6m, 7m, 10.5m for 1,2 & 3 storey dwellings consecutively. The overall height is 5m, 8.5m and 12m for 1,2 & 3 storey dwellings.	The SEPP restricts height of dwellings to 8.5m.
Principle open space areas of lots with a width of more than 15 metres require an area of 25m ² with a minimum dimension of 3m. Lots with a width of between 10-15 metres require a minimum open space area of 20m ² , minimum dimension of 3 metres. No gradient is specified.	Principle open space lots for new dwellings (on lots over 450m ²) require an area of 24m ² with a minimum dimension of 4 metres and minimum gradient of 1:50.
Earthworks is allowed where not more than 1.2m below ground level.	Earthworks are required to be not more than 1 metre below ground level.
Fill of sloping sites is allowed with no mention of dwelling setback from boundary. Fill is not more than 1.2m above ground level.	Fill is allowed where dwellings are setback 2m from boundary. Fill is not more than 600mm above ground level.
Retaining walls up to 1.2 metres in height are allowed up to 6m from a waterbody	Not specifically addressed.
Swimming pools are allowed however ASS is not addressed.	Complying development for the housing code is not allowed in ASS class 1 and 2
Fences are allowed up to 1.2 m, constructed of solid material.	At least 50% of the fence has to be open for the upper portion.
The Code allows for some merit assessment by the DRP (refer clause 2.2.3).	The SEPP has no element of merit assessment.

Note: The structure of controls for complying development is more complex than the SEPP. Controls have been broken down according to width of the lot, ie. 5-10m, greater than 10m – 15 metres, greater than 15 metres. This makes comparison of the two codes difficult.

It is considered that the Part A of the code (dealing with exempt and complying development) should only apply to traditional detached dwellings (on lots less than 450m²) and dwelling types not contemplated by the SEPP (soho, terrace, zero-lot, plex and mews housing), otherwise, the SEPP should apply. This approach is recommended for the following reasons:

- The significant departures proposed in the code (from the SEPP) have not been justified and in most cases, will result in increased risk of environmental impacts and less quality design outcomes. The changes in the table above do not appear to be related to the inclusion of new housing types as complying development and have not been justified.
- The issue of up-keep and maintenance of the codes has not been addressed. The SEPP will most likely become amended as time goes by, increasing the differences between the two and inconsistencies in standard housing products.
- The document is not user-friendly for applicants proposing simple development. The complexity of the code is an issue not only for private certifiers but for technical staff providing advice to applicants.

The code includes exempt and complying provisions for commercial development. This is not considered necessary and the State SEPP should apply.

Residential Development Controls (for development that is not complying or exempt)

Preliminary comparisons have been made between Part B of the codes (which provides controls for residential development and subdivision) and Section A1 (Residential and Tourist Development) of Council's DCP.

Significant variations between the two are outlined in the table below.

Development Codes	A1
Cut and fill (outside the building footprint) is limited to 1.2m above or below finished ground level.	Maximum cut and fill is 1m, retaining wall is maximum 1.2m.
Allows retaining walls on boundaries if they are less than 600mm in height.	Cut is to be setback from the boundary by at least 900mm and fill is to be setback from the boundary a minimum of 1.5metres.
Frontage setbacks are more complex, broken into different zones; articulation; garage door lines; building lines. Setbacks vary depending on the zone and the width of dwelling. Generally, The building line setback for lots greater than 15m in width is 5 metres, for lots between 10 and 15 metres is 3 metres.	Generally requires a 6m front setback or greater where adjoining properties have buildings setback a greater distance.
Whilst the code states that garage doors do not exceed 40% of the length of the lot, it also allows for triple garage doors.	A1 places limitations on the width of garage doors along a street (50%) of the building elevation and seeks to reduce their dominance.
Building height measured to the eave is 3.6m, 7m and 10.5m for 1,2 and 3 storey dwellings consecutively. Overall height is 5m, 8.5 and 12 metres for 1,2 and 3 storeys.	Height to wall plate is 8.5m and overall height of 9m for dwellings, dual occupancies, and town houses. For shoptops, overall height is 13.6m and wall plate

Development Codes	A1
	height is 11 metres. For residential flat buildings, maximum overall height is 12.2 metres and 9.6 metres is the maximum wall plate height.
Private open space requirements are provided depending on dwelling categories and lot widths.	Private open space is mostly controlled through deep soil zones and limitations on impervious areas.
Landscaped areas required range from 5% to 20%	Significant deep soil zones are required both in the front and rear setback areas. In addition, limitations are imposed on impervious areas ranging from 70% to 60%.
Front fencing provisions allow for solid fences up to 1.2 metres in height.	A1 limits fencing to solid component with a maximum height of 600mm and above that 60% openness ratio.
Side and rear setbacks are provided for each different housing type, including detached dwellings. Rear building line setback is 3 metres.	A1 requires deep soil rear setbacks of up to 5 metres.
Side setbacks for multi-dwelling housing is up to 2.5 metres.	A1 provides for various side setbacks for townhouses, generally 1.5 metres and up to 4 metres where a primary window faces the side boundary. Additional separation between building setbacks are required.
Side setbacks for apartments is calculated as 25% of the height.	A1 requires 1.5 metre setbacks for apartments and up to 6 metres where a primary window faces the side boundary. Additional separation between building setbacks are required.

It is acknowledged and accepted that alternative controls are required for small lot housing and new housing types. However, the code proposes significant departure from A1 for development that is not complying or exempt (including traditional detached dwellings, duplexes, townhouses, villas, residential flat buildings and retirement communities). There is no reason given as to why A1 should be replaced for these dwellings and significant departures in controls have not been justified.

A1 was developed in consultation with the local community. It seeks to provide greater amenity and increased landscaping in urban areas in the Tweed. Council's A1 includes significant controls encouraging additional landscaping areas (through requirements for deep soil zones and limitations on impervious areas). The objectives of these controls is to ensure that land retains its ability to permeate water, to retain and enhance fauna and flora corridors throughout suburban areas, to provide space for mature tree growth and vegetation and to retain existing mature vegetation.

A1 also includes controls to provide appropriate separation between buildings to maintain privacy and residential amenity.

Whilst it is acknowledged that reduction in these requirements is necessary to facilitate small lot housing, these requirements should be maintained for all other development (ie non-complying development).

The codes are performance based (refer section 1.8) whereas A1 has deliberately been drafted as a prescriptive code. Whilst this is not a problem in itself, it creates greater confusion and complexity for assessment.

In terms of height, the codes will allow for higher detached dwellings, dual occupancies and town houses compared to A1. Notwithstanding, it is noted that the Draft LEP provides for a maximum height of 13.6m over the site, however this document is currently on exhibition and submissions on this matter will be considered by the Council upon close of exhibition.

Tweed Shire has controls on cut and fill to ensure that planning and development is responsive to site constraints, to limit risk of erosion and promote more sustainable outcomes. The codes allow for more relaxed cut and fill provisions which with no justification. Modifications relating to cut and fill are not supported.

Furthermore, Part B of the codes includes a series of tables which provide controls for residential development, with reference to different categories of buildings. It is a complex document. Determination of various development parameters (relating to side, rear and front setbacks, provision of private open space and landscaping etc.) requires reference to multiple tables located throughout Part B. This is a complicated process and combined with the overall process proposed to apply to development in Kings Forest and Cobaki will result in confusion and additional resources to implement (both for applicants and Council).

Housing Types – Objectives

The codes indicate that variations to any of the controls in Part B will be assessed against the objectives of the code, including housing type objectives, however it is not clear on which objectives, or the hierarchy of objectives that would apply. Further detail on this should be provided in section 3.3, in order to assist applicants and assessing officers.

It is considered housing type objectives should be amended to include:

- Provision for useable private open space areas and quality landscaped areas
- To maximise solar access
- To ensure that gated communities do not occur
- To limit cut and fill

Town Centre and Neighbourhood Centres - Objectives

This section outlines objectives and principles relating to the town centres and neighbourhood centres. It should include the following objectives:

- To provide opportunities for community interaction
- To promote active edges and walkable town centres
- To ensure amenity of residential development is protected

Section 4.1 outlines the controls for centre hierarchy. It is considered that maximum floor space areas of retail, commercial and service use mix should be provided. This should be based on a detailed economic analysis.

Subdivision Design and Layout

The objectives for neighbourhood and subdivision design should include the objective to ensure that subdivision design is responsive to site constraints. This is a fundamental principle to good planning and the purpose of site analysis – to identify site opportunities and constraints in order to maximise optimum outcomes for the development and limit environmental impacts.

Section 5.10 of the codes include the objective to “minimise through traffic” in the residential neighbourhood streets.

This is a major concern as it will result in poor subdivision design utilising cul-de-sacs and creating enclaves, similar to gated communities. This is undesirable as it results in future traffic issues (through one-way in and one way out only), car dependent design, segregated communities and illegible street networks.

The objectives should be amended to ensure that subdivision design:

- provides a choice of clear and multiple links to the surrounding area, and
- is legible and includes interconnected streets.

These are principles that have been endorsed in publications by the Department of Planning and are common in best practice urban design and planning (refer “Residential Subdivision: A handbook for the design and planning for new neighbourhoods”, prepared by the Department of Urban Affairs and Planning (Urban Design Advisory Service) 2000).

Further, the codes do not maximise footpaths or cycleways (direct and off-road). These elements, combined with a grid design are necessary to achieve Active Living principles to encourage more sustainable and healthy communities. Active Living principles encompass best practice and are endorsed by the Premier’s Office.

Table 5.2.1 includes minimum areas and dimension controls for new lots. A minimum lot size should be specified for non-urban development lots, say 1000m², to ensure that viability of retail and commercial services is not cumulatively impacted upon by residential development. This table also identifies that development lots for multi-unit dwellings can be 1000m², however it is not clear if this applies to townhouses and residential flat buildings. A1 has requirements that certain types of residential flat buildings are on lots with a minimum size of 2000m². As above, A1 should continue to apply to residential flat buildings and minimum lot sizes should be in-line with those specified in A1 – Residential and Tourist Development.

The Plan of Development (POD) requirements (section 5.4) state that the POD should show location and characteristics of public open space and parks but no criteria is provided. The DCP – Section A5 Subdivision Manual should be applicable in this regard (refer engineering comments below).

Development Contributions – Subdivision Stage

Whilst it is considered acceptable for payment of contributions at the subdivision stage, the equivalent tenement rates referred to in the controls are no longer applicable. Councils section 94 plans charge is now on a per bedroom basis. Maximum bedrooms yield must be specified in nominated lots to allow early payment, or the rate applicable will be the maximum bedroom yield (ie. +4 bedrooms) will be applied.

Tree Retention and Biodiversity

The code includes objectives in section 5.16 to protect and enhance environmental protection zones and maintain biodiversity values within each area. The controls need to include a requirement that development is undertaken in accordance with approved management plans.

Council officers are currently developing a Biodiversity DCP, which deals with landscaping, rehabilitation and restoration of natural areas. Each code should require that all current controls are met at the time of subdivision. This will allow for application of updated best-practice standards in the future.

Additional Comments and Anomalies

Additional comments and anomalies are outlined in the table below.

Section	Comment
1.2 The Cobaki Lakes Concept Plan	This section states that the Concept Plan approves various aspects of development – it should be deleted to avoid confusion and potential inconsistency. It is considered unnecessary as the DOP approval will outline what the Concept Plan approval includes.
Matrix	
Town Centre/ Neighbourhood Centre Domain	<ul style="list-style-type: none"> Urban Design Principles (UDP) state that legible off-street parking is provided, this is not supported – off-street car parking should not be visually dominant. UDP should include the intent to create view corridors (to assist with legibility and between major parks / community focal points). UDP should include the provision of a central, community focus point. UDP should state that landscape concept should include provision of shaded car parking areas and high quality streetscape. UDP should seek to reduce acoustic impacts from commercial and retail uses through design and treatment of dwellings).
Residential Domain	<ul style="list-style-type: none"> UDP should include principles to provide medium – high density residential areas within walking distance to community facilities and public transport.
Public Open Space	<ul style="list-style-type: none"> The use “food and drink premises” and “kiosk”, should only occur where indicated with an asterisk on figure 1.2.1 for Cobaki Lakes Development Code. This should be stated in the Matrix. These uses should be deleted from the matrix in Kings Forest Development Code. Stormwater path and treatment must not be incorporated within areas to be dedicated for open space recreational purposes.

Section	Comment
Environmental Protection Area	<ul style="list-style-type: none"> The Matrix should state that low impact community trails are not suitable in all environmental protection areas, only areas approved by Council. UDP should state that environmental protection areas should be rehabilitated and revegetated in accordance with approved management plans.
Lake	<ul style="list-style-type: none"> As indicated previously, is not to be dedicated to Council for on-going management.
1.3 Vision and Development Objectives	
	<ul style="list-style-type: none"> As previously stated, an employment node should be part of the vision, or at least the provision employment opportunities for residents. The vision should be to aim for a self sufficient community.
Key development objectives	<ul style="list-style-type: none"> Insert two additional objectives as follows: To ensure development is sequenced with delivery of infrastructure, parks and community facilities. To provide a network of accessible local parks in each precinct. Include in objective 5, to provide “permeable street networks” and good access to public transport, parks and amenities. This objective will not be achieved unless a connected street network is provided.
1.4 The Purpose of this Code	
	<ul style="list-style-type: none"> As above, the Design Review Panel (DRP) should be from a list of providers, selected by the Department of Planning and Council to maintain quality control.
1.6 How to Use this Code and 1.7 Statutory Context	
	<ul style="list-style-type: none"> Refer comments above on additions and modifications to steps to include in this section (for building and subdivision). The Development Code needs to be read in conjunction with Section A1 and Section A5 as identified in greater detail above. All other relevant sections of the Development Control Plan should be applicable (such as Section A7 – Child Care Centres). Refer comments above on relationships with other planning instruments and SEPPs.
1.8 Variations to Development Code Controls and the Cobak Lakes Concept Plan	
	<ul style="list-style-type: none"> This section states that variations to the Code will be assessed on its merit. This should only be applicable ton non-complying development assessable against Part B of the Code. This section states that trading is possible between precincts, this is not supported as detailed above.
1.9 Developer Design Guidelines	
	<ul style="list-style-type: none"> This section should clearly state that the DRP Pre-Approval certificate must certify the development is in accordance with the Design Guidelines and the Code.
PART A – Exempt and Complying Development	
	<ul style="list-style-type: none"> Refer comments above.

Section	Comment
2.2 Complying Development Controls	
	<ul style="list-style-type: none"> • 2(a) should be amended from “building guidelines” to “design guidelines for buildings”. • Reference is made throughout the Cobaki Lakes code to Kings Forest, this should be amended. • 2.2.1 should reiterate the requirement for a DRP Pre-approval certificate. • 2.2.2 does not include controls for single storey dwellings. • 2.2.3 (2) allows the DRP to determine the appropriate floor area of an outbuilding. This is a concern as the code should be a “tick and flick” type document, with limited clauses requiring merit assessment. • 2.2.4 (1) as above.
Part 3 – Residential Development Controls	
	<ul style="list-style-type: none"> • Refer to significant concerns outlined above. • Table 3.1.6.1 (and elsewhere in the Code) refers to “first floor living solutions”. A definition is required for this term. • It is unclear what Figure 3.1.8.1 is trying to achieve. • Parking requirements and dimensions are provided in section 3.1.8. This should be deleted as A2 should apply.
Part 5 Subdivision Controls	
	<ul style="list-style-type: none"> • Section 5.1 relates to Development Staging. It should make reference to the sequence plan (as above) as well as state that core infrastructure (etc.) is required for each precinct prior to their subdivision. • Section 5.4 controls should include the requirement for POD to show maximum bedroom numbers as above, as well as driveways, location and details of retaining walls, stormwater management details, gateway and entry statements, location of easements, location and sizing of open space (compliant with A5 – Subdivision Manual). • Section 5.4 – controls for PODs continued. POD’s should provide a connected street system (as above), inclusion of latest communication technology, major view corridors and require subdivision compliant with A5. • Section 5.4 (10) of the Cobaki Lakes Development Code, requires that the plan of development incorporate the built form controls indicated in Figure 5.4.1, it is unclear how this will impact upon the height controls in the residential development controls which provide for a greater overall height than 8 metres. • In addition to the above, the POD controls should include the following requirements for subdivision in the town centre and neighbourhood centre precincts: land use designations and minimum – maximum floor areas and commercial mix, based on economic analysis; plot ratio and site cover requirements and compliance with part 4. • Section 5.5 (7) as above, the design guidelines should be consistent with the codes and not allow for interpretation, particularly of objectives. If changes to the Code are required, they should be modified through application to the Department of Planning

Section	Comment
	<p data-bbox="628 297 799 327">/ and or Council.</p> <ul style="list-style-type: none"> <li data-bbox="555 344 1474 546">• Section 5.18 (1a) - This section includes controls for acoustic mounds or fences along Cobaki Parkway or Kings Forest Parkway, as well as the requirement for a combination of measures to mitigate traffic noise, including setbacks, internal dwelling layouts etc. From a visual amenity and connectivity point of view, it is considered more appropriate on a Greenfield site to mitigate noise through design and planning, as opposed to walls.

Aboriginal Cultural Heritage

- Both the Cobaki and Kings Forest sites have pre-acknowledged and potential items and landscapes which could require further investigation of Aboriginal Cultural Heritage. It is considered that the Codes should contain appropriate controls which highlight the need for any preliminary investigations and subsequent detailed examination of these issues.

Buildings Services

- The NSW Housing Code was developed to provide one set of controls for housing across the state to simplify the process and provide consistency. The proposed code will complicate the system and undermine this intent.
- Plan of Development requirements relating to each site may be lost over time if they are only provided on the 88B instrument.

Infrastructure Engineer

Section 1.0 Introduction

Section 1.7 (page13) outlines the statutory context of the codes and relationship with other Plans. It states that:

"The Development Code provides site specific detail controls, where necessary, to achieve the objectives and allow effective implementation of the Cobaki Lakes Concept Plan."

It goes on to say that the Code is to be read in conjunction with select sections of the Tweed DCP 2008 (not 2007 as stated in the Code), being:

Section A2 - Site Access and Parking Code;
 Section A3 - Development of Flood Liable Land;
 Section A4 - Advertising Sign Code; and
 Section A11 - Public Notification of Development Proposals,

with the Code taking precedence in the event of any inconsistencies.

The codes do not reference DCP Section A1 - Residential and Tourist Development Code or Section A5 - Subdivision Manual (although it states that it is to be read in conjunction with

"*Engineering Design and Landscape Specifications*", however these have limited statutory weight without the parent Subdivision Manual).

This is fundamentally opposed by Council, and is contrary to the above intention of the codes to contain only necessary site specific controls. A1 and A5 should be the primary development controls for development of Cobaki Lakes and Kings Forest, and each code should only provide controls additional to these documents, where such variations are justified and consistent with the Concept Plan. For example, small lot subdivision is proposed by the Concept Plan, however is not catered for in either A1 or A5 (as it is outside of what is permissible under the Tweed LEP). It would be reasonable for the codes to provide additional controls for small lot subdivision design, infrastructure servicing, and subsequent residential / commercial development. However they need not control engineering aspects such as road design, stormwater management or open space, which are adequately covered by DCP A5. The codes conflicts with A5 are discussed in detail below.

Part A Exempt and Complying Development (Section 2)

Part A of the codes relates to Exempt and Complying Development. Detailed assessment of this Part shall be provided by other officers, however it is recommended that this Part be deleted and the SEPP Exempt and Complying Development Code 2008 be adopted for the development. This avoids unnecessary duplication.

It is noted that Section 2.2.6 of the complying controls allows garage/carport setbacks of 4.5m. This does not allow tandem parking (to the carport / garage) of a B99 or a B85 vehicle (refer AS 2890.1). The minimum front setback should be 5.5m as tandem parked vehicles must not encroach into the road reserve.

Section 2.2.15 (1) of the complying controls state that only one off-street car space is required for any new single dwelling. This should be amended to two.

Part B Development Controls

Section 3.0 Residential Development Controls

Section 4.0 Town Centre and Neighbourhood Centres

Comments shall be provided by Town Planners regarding the development controls in Sections 3.0 and 4.0. However as discussed above, DCP Section A1 - Residential and Tourist Development Code should be the primary reference for development controls for Cobaki Lakes and Kings Forest, and each code should only provide additional controls specific to Cobaki Lakes and Kings Forest, such as small lot housing.

Section 5.0 Subdivision Controls

As the codes do not reference DCP A5 - Subdivision Manual, it attempts to provide a stand alone document for the design of subdivisions and the provision of public infrastructure. As a result it has a high degree of duplication with A5. The codes include variations to Council standards on matters not relating to specific aspects of Cobaki Lakes or Kings Forest. Each code should therefore be substantially amended to adopt A5 as its primary reference for subdivision controls, together with the suite of 13 Development Design Specifications and

32 Development Construction Specifications referenced by A5, and apply them to the Cobaki Lakes or Kings Forest development unless otherwise specifically stated in each code. Those sections of the code that are already addressed by these Council documents should be deleted to avoid issues with duplication, implementation and future updates.

Council's Subdivision Manual and referenced Specifications have been compiled and updated with development industry consultation and public exhibition over many years, and have been implemented over a wide range of conditions. The documents reference in detail Australian Standards, NATSPEC, Austroads, WSAA and other recognised best practice manuals and are therefore considered to provide developers with appropriate minimum standards and performance criteria for public assets. As Council ultimately inherits the subdivision assets, it is imperative that these assets meet the standards necessary to ensure their effective and efficient operation and maintenance for their full life cycle, to avoid unduly burdening ratepayers.

Each code should list those areas where departures for small lot subdivision, environmental sustainability, good town planning or other matters are justified and supported by Council (as the authority responsible for the ongoing ownership and maintenance of public infrastructure throughout Cobaki Lakes and Kings Forest) and the Department of Planning (as the consent authority for the Concept Plan).

Specific issues with the code shall be provided by other engineering officers, however the following aspects of the code relate to the issues raised above:

Page	Clause	Description	Issue
13	1.7	The Development Code is to be read in conjunction with limited sections of the Tweed DCP, being A2, A3, A4 and A11.	The code should also be read in conjunction with A5 - Subdivision Manual. The code duplicates many sections of A5, but is not a comprehensive subdivision code. This leaves any issues not addressed in the code without a referenced standard, meaning that Council or private certifiers may have to negotiate these aspects with each project application, which is unacceptable. It is further recommended that those areas of duplication are removed to consolidate the code for those issues specific to Cobaki Lakes or Kings Forest, such as sections on erosion and sediment control, development of flood liable land, landforming, pedestrian and cycleway design, and water quality objectives.
79	3.1.11	Development of Flood Liable Land is to be in accordance with A3 except where varied by Section 5.11 of the code	This section duplicates clauses in A5, A3 and Council's Flood Risk Management Policy, so need not be incorporated into the code. No variations to these policies should be considered, as these controls have been established via a floodplain risk management approach, in accordance with the NSW Floodplain Development Manual.
114	5.7	Proposes a system whereby developer contributions are paid at the subdivision stage based on the residential yield of the Nominated Lot (as specified in an approved Plan of Development), at an assume rate (per ET or bedroom).	Whilst forward payment is generally acceptable to Council, the Code needs to better outline the process for forward payment of developer contributions based on the Plan of Development for the subdivision. Worst case or accurate bedroom numbers need to be designated for each Nominated Lot.

Page	Clause	Description	Issue
			<p>Based on Council's understanding of the process for the forward payment of contributions, each code should specify the following:</p> <ul style="list-style-type: none"> • Contributions paid in advance to Council shall not be refunded, should development yields reduce for Nominated Lots. • Development applications to modify the Plan of Development in order to increase development yield of a Nominated Lot must include a calculation of the outstanding contributions to be paid, and this balance shall be paid to Council in accordance with that consent. • Nominated Lot yield shall be calculated based on worst case bedroom rates included in the Development Code and agreed to by Council, or at the maximum bedroom amount.

Page	Clause	Description	Issue
115	5.10	Local Streets should be designed to discourage through traffic. Permit cul-de-sacs up to 200m and servicing 24 dwellings.	<p>The objectives and controls regarding through traffic need to be clarified in each code. Council requires a permeable street network with a high level of connectivity between neighbourhoods. At the same time, the road network should discourage through traffic from external catchments in local streets (i.e. rat running). These are well established urban planning principles, however both codes are currently ambiguous and could be interpreted to discourage the desired network connectivity.</p> <p>A highly connected local street system allows high levels of movement within the estate without being forced to use the connector and arterial road system. Highly connected street patterns are more understandable, and minimise the impact of through traffic. Connections between local streets and higher density residential and commercial development make it attractive to provide local bus services. When designed in conjunction with a permeable footpath and cycleway network, with connections to safe, appropriate and attractive public open spaces and recreation areas, such a street pattern facilitates environmentally sustainable communities that meet the diverse and changing needs of the community. These principles are already contained in A5 and the road design specifications and should be adopted for Cobaki Lakes and Kings Forest.</p> <p>Realignment of the distributor road in Kings Forest (Kings Forest Parkway) to eliminate the 90 degree bends and provide through traffic with obvious priority will provide many benefits in simplifying the road network, reducing queue lengths and discouraging “rat running” through local streets.</p> <p>Cul-de-sacs up to 200m and 24 dwellings should only be considered where constrained by landforming limits, and where this leads to better urban design outcomes (as per A5). As the applicant has not provided a landforming concept for the site, the adoption of the longer cul-de-sac lengths cannot be justified as part of each code. Adoption of A5 by the applicant would preserve the ability for Council to apply this with future project applications where appropriate.</p>
118	5.11	Water Sensitive Urban Design (WSUD) - specifies treatment train approaches that might be applied in various conditions.	<p>The implementation of WSUD is supported for Cobaki Lakes and Kings forest, in accordance with D7 subject to site constraints such as topography/slope, and soil type. A reference to D7 would be sufficient in this regard.</p> <p>It is difficult to assess the proposed treatment trains when a preliminary stormwater management plan for the trunk drainage system for the development has still not been provided (refer to Section 2 above). Treatment trains 1-3 require swales and/or</p>

Page	Clause	Description	Issue
			bioretention trenches, but these measures have not been included in the standard road cross sections elsewhere each code. As such, Council cannot assess the impacts of these measures on road widths, pedestrian movements, allotment accesses, service allocations and maintenance requirements. Bio-retention trenches are not recommended for slopes exceeding 5%, so should be excluded from TTT3.
124	5.11(13)	Development of Flood Liable Land requires consideration of emergency response, impacts of filling etc in accordance with Council controls	This section duplicates clauses in A5, A3 and Council's Flood Risk Management Policy, so need not be incorporated into each code. These controls have been established via a floodplain risk management approach, in accordance with the NSW Floodplain Development Manual.
126	5.12(3)	Mass landform change - the proportion of subdivision with cut/fill departing from natural surface level by more than 8m shall not exceed 20% in plan area.	This adopts the mass landforming standards from D6 for industrial subdivision. This is considered excessive for residential/mixed use land, where smaller lots, sympathetic building designs and reduced development footprints are to be provided. The D6 standard for residential subdivision (areas with cut/fill of more than 5m should not exceed 10% of the site) should be adopted for Cobaki Lakes. As the applicant has not provided a landforming concept for the site, the applicant cannot justify adoption of the higher mass landforming criteria as part of the code.
	5.12(4)	Residential development controls apply for allotments with cross fall gradients and longitudinal gradients greater than 5% and 10% respectively.	What are these development controls? Should adopt related controls in A1 (limitations on retaining wall heights, alternate building types on land > 10% slope etc.)
128	5.15	Services are to be located within the footpath in accordance with a set of typical layouts. No easements required for public sewers in private lots	Services should be provided in accordance with the verge allocations specified in D1, except in specific circumstances (such as small lot housing) that need to be nominated by the applicant. All variations to the standard allocation need to be properly assessed by the service provider / asset owner, as variations could have important implications for protection of services and the ability to maintain the infrastructure with minimal cost and disruption. Fibre telecommunication services need to be provided to each allotment in a separate conduit/pit system, which may affect other service allocations. The applicant is requested to liaise with Council and other service providers on the service allocation issue and amend the Code accordingly. Where public infrastructure (water, sewerage, stormwater etc) is located on private land, it is Council policy that these services be located within easements benefitting Council, otherwise Council will not accept the infrastructure.

Further Correspondence with the Applicant

On 8 October 2009 a meeting was held between Council officers and the applicant to discuss issues with the Kings Forest Development Code raised in Council's PPR submission. Note that the Kings Forest and Cobaki Lakes Codes are considered to be substantially the same document. At Council's request, the applicant provided Council with a word document version of Section 5.0 the draft code (the file provided was actually a version of the Cobaki Lakes Development Code current at that time). Council officers amended that document in accordance with the issues discussed above, and returned it to the applicant for consideration (via email 13 October 2009).

The applicant has incorporated very few, if any, of the requested amendments into the exhibited version of the Code.

Since exhibition, the applicant has approached Council engineering staff to try and resolve the infrastructure issues relating to the Kings Forest and Cobaki Lakes Development Codes, specifically Section 5.0. Meetings were held on the 14th and 19th January 2010. As an outcome of these meetings, it is Council's understanding that the applicant generally accepts Council's issues relating to the adoption of DCP-A5 and the Design and Construction Specifications, and a re-write of the each code to reduce the degree of duplication. At the time of writing, further meetings were scheduled for the first week of February to try and draft an amended Section 5.0 of the Code, in such a way that as much of the document as possible can be agreed between Council and the applicant, and the remaining issues in contention can be itemised and submitted to Department of Planning for further discussion and hopefully resolution.

Traffic

It is noted that Council's Traffic Engineer has outstanding issues in relation to traffic in Kings Forest. In summary, a traffic impact analysis is required which includes an assessment of the major internal intersections. This has not been provided to date. The alignment of the major collector/distributor road within the estate (Kings Forest Parkway) as shown on the concept plan is not supported. This major road should be shown as being on a continuous or 'through' alignment throughout the estate to enforce its priority route status (i.e. without 90 degree changes in alignment at internal intersections with other streets and major driveways.) Preliminary intersection investigations using SIDRA, undertaken by Council officers confirm concerns. The first major internal roundabout has a significantly decreased Level of Service (LOS) due to the 90 degree priority arrangement. Council's minimum level of service for its (ultimate) road network is LOS "C". Preliminary estimates show that during the AM peak period the proposed roundabout configuration will handle about 1100 vehicles per hour on one leg before one or more legs begin to fail. When 1200 vehicles per hour are reached, one or more legs of the intersection will fail (LOS "F"). This means that traffic will hardly move on one or more legs. Rectification of this problem would require a total reconfiguration of the internal road geometry. Traffic signals may not be an option. The proponent's response to this is that "roundabouts will provide for a high level of service in relation to the planned ultimate traffic volumes using them within the estate", however supporting evidence is not provided to justify the road geometry proposed. Signalised intersections should also be considered at the major internal intersections to provide better

delineated pedestrian crossing points across the wide four lane roads. However this may not be possible due to the road geometry issue discussed above.

In terms of the Kings Forest Code, there is concern that no mention is made that direct vehicular access to the proposed Kings Forest Parkway will be prohibited.

As below, each code should require footpaths on both sides of distributor roads, neighbourhood connector roads and shopping access streets. Footpaths are required on at least one side of all other streets as per Council's standards.

Section 3.1.2 (residential development controls) of each code allows a 4.5m setback for double garages. This setback should be 5.5m to enable tandem parking in front of the garage without the rear of the vehicle obstructing the road verge.

Section 5.13 (subdivision controls) states that Council's Local Traffic Committee will determine bus routes, however this is not the case. Bus routes are determined by the bus operator.

The street network sections in Figure 5.10.2 (subdivision controls) are incorrect. Some verge widths are 10 times what is required; the neighbourhood collector road should state VPD $\leq 7,000$ (not $>7,000$ as shown) and the major distributor road (Kings Forest Parkway) has 2 x carriageway widths of 8,200 which are not functional. (With 2 x 3.5m lanes there will be only 1.2m remaining which is unusable, considering the cycleway will be off street). These carriageways should be at least 10m wide each to incorporate a traffic breakdown lane.

DEVELOPMENT ENGINEER

Contradictions in engineering standards

Each code quotes a number of contradicting engineering standards, including the following:

- *"To adopt AMCORD standards where variation from stated controls is proposed."* (page 103 section 5.2 (13))
- *"unless otherwise specified above all streets within the development shall generally be designed in accordance with Tweed Shire Council Development Design Specification D1 – Road Design."* (page 117 section 5.10 (9))

AMCORD and Council's Development Design Specification D1 – Road Design standards differ significantly from each other with the AMCORD specification providing a much lower standard of road, i.e. reduced road widths, no footpaths on access streets or cycle paths on bus routes etc.

Subdivision Road Standards

The following table provides a comparison between the codes (based on AMCORD and the cross sections documented on page 116 of the Code) and Council's DCP Section A5 Subdivision Manual (Development Design Specification D1) – Road Design.

Road Standard	Development Code & AMCORD	Council's DCP Section 5A Subdivision Manual
<p>Laneway</p> <p>Standard from AMCORD as referenced in the Kings Forest Development Code</p>	<ul style="list-style-type: none"> • 3m wide pavement • no kerb required • limited to 100 vpd 	<ul style="list-style-type: none"> • 6m wide pavement • upright kerb required • up to 3000 vpd
<p>Access Street</p> <p>Standard from AMCORD as referenced in the Kings Forest Development Code</p>	<ul style="list-style-type: none"> • 5m wide pavement (up to 300 vpd) • 5.5m wide pavement (up to 2000 vpd) • 3.0m verge width • no footpath • 14m road reserve 	<ul style="list-style-type: none"> • 6m wide pavement • 3.5m verge width • 1.2m footpath one side • 14.5m road reserve • up to 3000 vpd
<p>Access Street with bus route</p> <p>Standard from AMCORD as referenced in the Kings Forest Development Code</p>	<ul style="list-style-type: none"> • 7.5m wide pavement • no other criteria given 	<ul style="list-style-type: none"> • 9m wide pavement • 4m verge width • footpath on one side • 17m road reserve • up to 3000 vpd
<p>Low Volume Neighbourhood Collector Road</p> <p>cross section shown on page 116 ~ Kings Forest Development Code</p>	<p>same as Council's Subdivision Manual, except;</p> <ul style="list-style-type: none"> • 4.5m verge width • no footpath 	<ul style="list-style-type: none"> • 11m wide pavement • 3.5m verge width • footpath both sides • 18m road reserve • up to 3000 vpd
<p>Normal Neighbourhood Collector Road</p> <p>cross section shown on page 116 ~ Kings Forest</p>	<ul style="list-style-type: none"> • 11m wide pavement • 5.5m verge width • no footpath or cycleway shown on cross section 	<ul style="list-style-type: none"> • 13.4m wide pavement • 3.5m verge width • footpath / cycleway both sides • 20.9m road reserve

Road Standard	Development Code & AMCORD	Council's DCP Section 5A Subdivision Manual
Development Code	<ul style="list-style-type: none"> • 20.9m road reserve • limited to 1000 lots 	<ul style="list-style-type: none"> • up to 7000 vpd
Distributor Road (Kings Forest Parkway) cross section shown on page 116 ~ Kings Forest Development Code	<ul style="list-style-type: none"> • 8.2m wide lanes • 5.5m verge width • no footpath or cycleway shown on cross section • 30.4m road reserve • 6m medium • vpd or lot no. not specified 	<ul style="list-style-type: none"> • 10m wide lanes • 3.5m verge width • footpath / cycleway both sides • 30m road reserve • 3m medium • up to 7000 vpd

The above table clearly documents the inconsistencies between the codes, which are based on AMCORD and DCP A5 - Subdivision Manual. The codes propose to reduce road widths on ALL roads and provides no footpaths or cycleways within the road reserve for any type of road.

Concerns are raised with this approach and Council's standards are preferred over AMCORD. Reasons for this are outlined below.

Reduced Road Widths

AMCORD was developed for a large metropolitan area in the early 1990s, with the most recent version updated 15 years ago. Tweed Shire is not a large metropolitan area, it consists of large rural areas, rural residential and growing urban areas. Public infrastructure is well catered for in metropolitan areas whereas both Kings Forest and Cobaki Lakes are 'greenfield' sites.

Council trialled AMCORD in the early 1990's when these standards were recognised as 'best practice'. This resulted in reduced road widths, no footpaths on bus routes and limited cycleways.

Council's current road standards were developed in the best interests of the local community and with the input of professional officers such as engineers and planners. Industry and community consultation also played a large part in the development of Council's current design and construction standards, including road standards.

Narrow road widths create a number of traffic problems such as no break down lane and issues with on street parking. A vehicle parked on an access street with the minimum road widths specified in AMCORD does not allow for two vehicles to pass such as a garbage truck and a standard vehicle.



It is stated in AMCORD that the pavement width is limited to 5.5m to deter vehicles parking opposite each other in the street and blocking traffic. Visitors and residents will park in the street and local access streets get congested with vehicles parking. Council's road standards were developed to allow for a wider road pavement width to facilitate two way traffic with a vehicle parked on the street.

Footpaths

Local residents have raised concerns in the past about the lack of footpaths in Tweed Shire, particularly in relation to pedestrian safety and the lack of amenity.

Tweed Shire is a high rainfall area, often resulting in the verge areas being soggy. Council's urban road standards were amended to incorporate a 1.2m wide concrete footpath on local streets to provide pedestrian safety and convenience.

The proposed codes and AMCORD do not provide adequate standards for footpaths. Footpaths are not indicated on the road cross sections documented in each code, resulting in high volume roads such as major connector and arterial roads.

All residential streets should be provided with a footpath particularly in an area such as the Tweed which has a significantly older population. Providing no footpaths in the development will particularly disadvantage the elderly, people with disabilities and mothers with prams. It encourages a car based subdivision and reduces walkability.

Cycleways

In recent years an increase in demand for cycleways has come from the local community. Council has incorporated cycleways into verge areas on urban low volume collector streets.

Council have had to retrofit many subdivisions with both cycleways and footpaths. Installation of cycleways should be provided by the developer at the time of subdivision construction to provide safety and amenity to the community and reduced public costs associated with subsequent retrofit.

Lack of Appropriate Easements on Council Infrastructure

The codes provide inappropriate standards for easements over public infrastructure. The following table presents a comparison between the minimum easement requirements specified in the codes and Council's DCP A5 Subdivision Manual minimum easement standards.

Minimum Easement Standards	Development Code	Council's DCP Section 5A Subdivision Manual
Sewer Infrastructure	<ul style="list-style-type: none"> No easement is required over public sewer located within a 	<ul style="list-style-type: none"> 3m wide easement over ALL public infrastructure (sewer, stormwater and retaining walls within the public



Minimum Easement Standards	Development Code	Council's DCP Section 5A Subdivision Manual
	residential lot less than 250m	reserve
Stormwater Infrastructure	<ul style="list-style-type: none"> No easement is required over public stormwater located within a residential lot less than 250mm 	<ul style="list-style-type: none"> as above

Council has the responsibility to manage public infrastructure after construction by the developer. Having no easements over sewer or stormwater pipes in private residential allotments creates a significant problem for Council maintenance, in particular the following;

- The land owner does not know where the sewer or stormwater pipe is located in their property, making it difficult to locate for any works required by the property owner. Therefore it is easy to damage Council's asset by breaking the pipe since the owner does not know where it is.
- The creation of easements for services over public infrastructure in private property clearly states who manages the line for repairs and maintenance, which is Council. This allows Council to enter the property and conduct repairs, without an easement the land owner has refused Council access in the past. An easement over the infrastructure allows Council to manage their asset.
- Proposed allotments with zero lot boundaries and no easements present a number of practical problems for maintenance of Council's assets. How do Council get machinery into the property to excavate the sewer pipe with no access or easement for location and right of entry?

Recommendations

The following statements in the code are either contradictory or are not appropriate. It is recommended that the following items are modified in the code:

- Section 5.2 Neighbourhood and Subdivision Design - Objective (3) states:
"To adopt AMCORN standards where variation from stated controls is proposed."
 It is recommended that the above statement be deleted and replaced with "To adopt Tweed Shire Council's DCP Section 5A – Subdivision Manual and associated development design & construction specifications where variation from stated controls is proposed."
- Section 5.10 Street Network and Design - Objective (6) states:
"To design streets within each neighbourhood primarily for people not cars, by providing a level of access, safety and convenience to residents in each neighbourhood."

It is not considered that the code will achieve this with proposed road widths, no footpaths or cycleways and zero lot boundaries. Residents will be forced to walk on the street which is not considered a good outcome. As above, Council's specifications should be adopted.

- Figure 5.10.2: Street Network Scheme which details a number of road cross sections is to be deleted. The figure contains inappropriate road cross sections which are not supported. As previously advised narrow road widths, lack of footpaths and cycleways are not acceptable.
- Section 5.10 Street Network and Design – Control (6) (a) states: *“establish a permeable walking and cycleway network that is based on AMCORD principles.”*

It is recommended that this statement is modified to refer to Council's DCP – A5 instead of AMCORD.

- Section 5.12 Land Forming – Mass Landform change criteria for Mixed Use Subdivision (3) states:

“The proportion of a subdivision site (plan area) that contains cut or fill areas with finished surface levels that depart from natural surface levels by more than 8m shall not exceed 20%, regardless of earthworks quantity. For the purpose of this Section subdivision site includes the parcels of land created for private sale and formal parks, and does not include undeveloped areas, areas retained for environmental purposes, roads or residential lots.”

The above information is extracted from Council's development design specifications (D6 site regrading) for industrial subdivision. The land forming controls applicable to industrial subdivision are considered excessive for residential subdivision.

It is recommended that this statement be deleted. Council's development design specifications (D6 site regrading) provides more appropriate controls for residential land forming, stating *“areas with cut / fill of more than 5m should not exceed 10% of the site.”*

- Section 5.13 Pedestrian, Cycle and Public Transport Network – Control (8) states:

“Bus stops are to be provided on-street and not within indented bays.”

It is recommended that the above statement be deleted. The safety of passengers at bus stops is essential. There is evidence that accidents occur when passengers attempt to cross the road and are hit by a vehicle overtaking the stationary bus. Indented bays or a pedestrian refuge in the medium strip is to be provided.

- Section 5.15 Location and Easements for Services – Objective (2) states:
“To ensure that future construction on small lots which may provide alternate foundation construction measures are not unnecessarily burdened by easements over minor public sewers.”
- Section 5.15 Location and Easements for Services – Controls (1) & (2) state:
“An easement of 3m in total width is to be provided where a rising main or trunk public sewer main (250mm in diameter or greater) is to be provided.”
“No easement is required over a public sewer is located within a residential lot, other than a trunk public stormwater pipe (250mm in diameter or greater) or a trunk sewer main (250mm in diameter or greater) or a rising main.”

It is recommended that the three above statements in relation to easements be deleted from each code as they are not considered appropriate. Tweed Shire Council is the public authority required to manage ALL public infrastructure after hand over from the developer. Council’s DCP – A5 Subdivision Manual specifies a 3m wide easement is to be provided on public infrastructure such as stormwater and sewer.

Conclusion

As mentioned above, Council officers have been undergoing negotiations with the developer in relation to abovementioned concerns. Should negotiations not result in amended codes addressing these concerns, it is requested that the Department of Planning consider Council’s recommendation to adopt Tweed Shire Council’s DCP – A5 Subdivision Manual and associated development design & construction specifications within each code and not AMCORD, which is an outdated specification and has inappropriate engineering standards for Tweed Shire.

Water and Sewer

The codes propose to take precedence over Council’s Development Design Specifications D11 and D12 and Construction Specifications C401 and C402 (called up by section A5 of the DCP).

Easements and Consequential Issues

Section 5.14 Table 5.14.1 Infrastructure Requirements states that water supply and sewerage infrastructure is in accordance with Tweed Shire Council Development Design Specifications D11 and D12 respectively. However, Section 5.15 excludes the provision of easements over sewers less than 250mm in diameter located in a residential lot.

As mentioned above, this is completely unacceptable to Council’s Water Unit and Council will not take ownership of any sewer located in private land not within an easement.

Council's experience, even though it has various rights under the Local Government Act for access and maintenance of its infrastructure within private land, has been residents refusing access and repeated difficulty with structures placed over sewers. Accordingly, it is preferred that sewers are located within the road reserve rather than private property as shown in the left hand side of Figure 5.15.3 if easements are not provided. The alignment in the right hand side of the figure will only be acceptable if the sewer is located within an easement for draining sewage a minimum of 3.0m wide in accordance with the provisions of Design Specification D12 Clause D12.07 4.

A result of the document specifying easements to not apply to reticulation sewers is that it could lead owners to put various permanent immovable structures in proximity to or over a sewer line within their property. Although Section 2.1 Exempt Development and Section 2.2 Complying Development provides for no development less than a metre from any public sewer main or to comply with any requirements specified by the appropriate sewer authority for building over sewers (2.1 Control (2) (b) and 2.2 Control (2) (c)), the absence of an easement on the property may cause a land owner to be unaware of the presence of a public sewer within the property, resulting in non-compliance.

In addition, there should be a general clause that requires all foundations for developments (exempt, complying and otherwise) to be founded at least one metre clear of the pipe horizontally and below the zone of influence of the pipe so that any future excavation can be carried out without disturbing the structure. This may require the foundation to go 300mm below the invert of the sewer.

The inclusion of the second paragraph of Note 1 from Section 2.1 in Section 2.2 would strengthen the provisions for complying development in proximity to service infrastructure.

Section 2 Exempt and Complying Development

Section 2 makes no provisions for the payment of s64 Water and Sewer Development Charges for complying developments that would increase the loading of the systems beyond one equivalent tenement (1 ET) or that levied at a previous development application. Examples of this are Plex development, Mews development, SOHO development and certain changes of use for commercial and industrial premises.

It is noted that the proponent has attempted to address this at subdivision stage, however Council's position is that the method proposed is unacceptable. This will be addressed further in comments on Section 5 where it is proposed that the Conditions for Complying Development (Schedule 3 Division 1 and Division 2) should require such developments to obtain a certificate under Sections 305, 306 and 307 of Water Management Act. (This Act is called up by s64 of the Local Government Act).

2.2 Complying Development

Subdivision 2 Building heights and setbacks:

2.2.6 Setbacks of dwellings and ancillary development from roads : Setbacks must not be taken to override the provisions of 2.2 Controls (2) (c).

2.2.7 Setbacks of dwelling houses from side and rear boundaries: Setbacks must not be taken to override the provisions of 2.2 Controls (2) (c). In addition, where a sewer is located within the rear of a property, and there is no rear access, the side setback should be such as to allow access for sewer maintenance and rehabilitation works when necessary. Of particular concern are “Terrace Dwellings” and “Zero Lot Dwellings” where without rear access, location of a sewer within the rear of a property may not be viable.

Subdivision 5 Earthworks, retaining walls and drainage:

2.2.18 Excavation of sloping sites: This should not permit excavation within an easement or above any public sewer that would reduce the cover to the sewer to less than 600mm.

2.2.19 Fill of sloping sites: This should not permit the placement of fill over any public sewer line that would result in the depth to the sewer exceeding 3.0m

2.2.20 Dimensions and construction of retaining walls: Retaining walls should not be constructed across, above, or parallel to a sewer main unless the structure has been specifically designed to allow excavation of the sewer. Such design will include foundations at least one metre clear from the sewer and below the zone of influence and bridging of the sewer. This may require the foundation to go 300mm below the invert of the sewer.

Subdivision 6 Ancillary development:

2.2.24 Swimming Pools: No swimming pool should be constructed in proximity to or over a sewer main in accordance with Section 2.2 Control (2) (c).

2.2.25 Fencing and Retaining Walls:

Fencing:- Solid (masonry) fences should not be constructed within an easement or across or parallel to a sewer main unless it is specifically designed to enable excavation of the adjoining sewer. It must be founded below the zone of influence and designed to bridge so that excavation could occur below it to repair the sewer. This may require the foundation to go 300mm below the invert of the sewer. Alternatively, light weight removable panels should be located across the line of a sewer. A parallel fence must be 1 metre horizontally clear of the sewer.

Retaining walls:- Retaining walls should not be constructed across, above, or parallel to a sewer main unless the structure has been specifically designed to allow excavation of the sewer. Such design will include foundations at least one metre clear from the sewer and below the zone of influence and bridging of the sewer. In addition, the height of fill should not be such that the depth to the sewer exceeds 3m nor should excavation in front of the retaining wall leave the ground surface less than 0.6m above the sewer.

Most of these items would be less of a problem if easements over sewers in residential properties are provided.

Relocation of Utility Services

Section 2 Schedule 3, Division 1 Item 11 and Division 2 Item 7 both indicate that complying developments that require alteration to, or the relocation of, utility services are not complete until that alteration or relocation is carried out. Any such works in relation to a water main or sewer may only be carried out with the approval of Tweed Shire Council under Section 68 of

the Local Government Act 1993. Accordingly, these items should be reworded to require application to Council.

Section 3 Residential Development Controls

There are several issues in Section 3 that require addressing, particularly since the proponent is attempting to avoid easements within residential private property.

There appears to be nothing in Section 3 that excludes building within easements or within any specified distance of sewer mains within private property. As detailed previously, there should be no building over sewers and foundations should be at least one metre clear of the pipe horizontally and below the zone of influence of the pipe so that any future excavation can be carried out without disturbing the structure. This may require the foundation to go 300mm below the invert of the sewer.

Sect 3.1.1 Site Work:

This section should include the following limitations:

Earthworks:- Excavation above sewers or in easements is not permitted if the cover to the sewer is reduced to less than 600mm.
Fill placed above sewers or in easements is not permitted if the cover to the sewer is increased to more than 3.0m.

Retaining Walls:- Retaining walls should not be constructed across, above, or parallel to a sewer main unless the structure has been specifically designed to allow excavation of the sewer. Such design will include foundations at least one metre clear from below the zone of influence and bridging of the sewer.

Sect 3.1.9 Fencing:

Fencing:- Solid (masonry) fences should not be constructed within an easement or across or parallel to a sewer main unless it is specifically designed to enable excavation of the adjoining sewer. It must be at least 1m clear of the sewer and founded below the zone of influence and designed to bridge so that excavation could occur below it to repair the sewer. This may require the foundation to go 300mm below the invert of the sewer. Alternatively, light weight removable panels should be located across the line of a sewer.

Sections 3.2 and 3.3 Single Dwelling Controls and Multi Dwelling Controls

Building in proximity to sewers:

These controls should include provisions to exclude construction of buildings or ancillary structures within an easement or closer than one metre (1m) horizontally to a sewer. All structures shall be founded below the zone of influence of any sewer line so as to permit excavation of that sewer for maintenance, rehabilitation or replacement purposes. There should be no relaxation of such provision.

These controls should provide for access where sewers are located in the rear of premises, as there is a need from time to time to be able to access the sewer with men and small machines for maintenance purposes. The terrace house setbacks would mean that such access would have to be made through the house itself unless there was a rear access lane. Likewise with some of the zero setback situations, it may be that such access is extremely problematic. If this is not possible, Council insists on sewers being located in road reserve or other public land.

In addition, it is considered that the basis for mandatory rainwater tanks connected to toilet flushing, laundry cold water and external use should be included. Council's requirement within its Demand Management Strategy is for detached dwellings to have 5000L tanks connected to 160 square metres of roof with other developments having tanks connected to as much roof area as possible, sized to maximise rainwater reuse.

Section 4 Town Centre and Neighbourhood Centres

References to Kings Forest Town Centre and Neighbourhood Centres should be changed to Cobaki Lakes in the Cobaki Lakes code. Also, the reference to Golf Course Precinct in Table 4.1.1 should be excluded from the Cobaki Lakes code.

It is considered that the basis for mandatory rainwater tanks connected to toilet flushing, external and other suitable uses should be included.

In addition, these controls should include provisions to exclude construction of buildings or ancillary structures within an easement or closer than one metre (1m) horizontally to a sewer. All structures shall be founded below the zone of influence of any sewer line so as to permit excavation of that sewer for maintenance, rehabilitation or replacement purposes. There should be no relaxation of such provision.

Section 5 Subdivision Controls

Sect 5.2 including Table 5.2.1 Minimum Area and Dimension Controls for New Lots: Council requires that the provisions for Zero-Lot Dwellings and Terrace Dwellings should include the provision of rear access where sewers are located within the rear portion of the lot. As discussed above, maintenance access to sewers by Council is essential.

Sect 5.4 Plan of Development:

The Plan of Development should also require the issues of water and sewer services to be addressed, particularly the location of sewers and address access for maintenance, etc.

Sect 5.5 Design Guidelines:

This section includes the brief item in Controls 9 (h) rainwater harvesting. It is considered that this could be expanded to outline the minimum requirements for rainwater tanks in these developments in accordance with Council's Demand Management Strategy.

Sect 5.7 Developer Contributions at Subdivision Stage

Section 64 Local Government Act Development Service Charges

This issue of concern is the method of levying S64 Contributions proposed. Council's position is that s64 Water and Sewer Development Charges should be applied on the same basis as the rest of the Shire at the time the actual development takes place. This does present the problem that there is no development application which will trigger the application of s64 charges by Council.

Accordingly, it is proposed that the Conditions for Complying Development (Schedule 3 Division 1 and Division 2) of Section 2 incorporate the requirement for complying developments that include multiple dwellings, (Plex, Mews, etc), SOHO dwellings, and change of use commercial and industrial development to obtain a certificate under Sections 305, 306 and 307 of Water Management Act. (This Act is called up by s64 of the Local Government Act).

It is understood that developments assessed under Sections 3 and 4 of the codes will be subject to the application of s64 Water and Sewer Development Charges in the same manner as other development applications within the Shire.

Sect. 5.9 Torrens Title Subdivision of Mews

The provision of services to such Torrens Title subdivisions will be a problem. Council policy provides that each lot should have a separate water service and water meter for billing purposes and separate house connections for sewer. The issue is responsibility for maintenance of pipes that are not within the lots. Normally, Council will accept responsibility to the meter for water supply and to the inspection opening of the sewer.

If the future subdivision of the mews is not considered at design stage, it will mean that:

- Water meters may be in a different lot to the lot serviced with internal water pipes running in the neighbouring property (particularly if there is only one street frontage and narrow width handles on battle-axe lots)
- A single House Connection serving multiple lots with private sanitary drains within the neighbouring lots.

Special rules need to be applied to either ensure that proper Council Standard sewers are provided to each lot or provisions put in place for adjoining properties to have pipes in the neighbouring properties. Council will only accept responsibility for sewers constructed in accordance with Council's standards and located within easements or public property.

Likewise, special provision is needed for water meters to be located on property not serviced by that meter and for the private pipes to traverse the adjoining property.

Generally, this style of development is considered unsuitable for Torrens Title Subdivision as there is no body corporate responsible for common issues. If it does proceed, easements for services will be necessary.

Sect. 5.11 Stormwater Runoff, Drainage and Flooding

Control (3) of this section provides for “Integrated Water Cycle Management” (IWCM). This will reduce water runoff as well as potable water demand and if any effluent recycling (sewer mining) is included, sewer loading. If such sewer mining is not carried out by Council, a license under the Water Industry Competition Act may be necessary.

Council’s adopted Demand Management Strategy requires that Greenfield development should mandate the provision of 5000L rainwater tanks connected to 160 square metres of roof area for individual dwellings with proportionate provisions for multi-dwelling, commercial and industrial developments. The tanks are to be plumbed to toilet flushing, laundry cold water and external uses. A provision for make up water from the potable water supply when the level in the tank drops is included.

It is required that the IWCM provisions be mandated throughout the various development types within the Development Code as prescribed in the TSC Demand Management Strategy.

Sect. 5:15 Location and Easements for Services

As stated previously, the provisions of this section that exclude easements over public sewers smaller than 250mm diameter within private property are completely unacceptable to Council and Council is not prepared to permit Council sewers to be located within private property without the easement provisions of Design Specification D12 applying, i.e. a 3m wide easement located centrally over the sewer line.

COMMUNITY SERVICES

The code needs to address affordable housing in a positive way, perhaps declaring it an objective, designating specific house types, or including incentives for affordable housing provision.

The code also has objectives for ‘self-contained’ neighbourhoods with a local focus, but the Subdivision Controls and defined residential precincts do not include any provisions to enable local, self-contained services or facilities. They are likely to result in undifferentiated residential tracts with no identity, dependent on car trips to services beyond walking distance.

Each code talks about transport and connectivity, but goes no further than a road hierarchy. The dendritic network concentrates traffic onto a single access point rather than dispersing it in a connective grid. Too much emphasis is placed on generous parking provision, both on street and per dwelling. There are no proposals for transport facilities and services to provide a congestion-free alternative to car use, or any transit lanes. The codes envisage cycleways on the high-volume Parkway, rather than being segregated, and does not provide direct cycle routes to adjacent towns. The codes do have pedestrian priority in the two centres as an objective, but more could be done through the design standards to improve accessibility by sustainable modes, health and wellbeing.

Provision for many social services remains undetermined in each code. For Kings Forest, the question of whether library services will be provided locally or in Kingscliff is not resolved (it may require a Council policy review). Police services, ambulance services, emergency services, health centres, a base for meals on wheels are not addressed in this planning. Disability and Ageing support services may require local facilities, but the facilities to be included in the envisaged Multi-Purpose Community Centre are not discussed. Similarly, there is no focus on facilities for children and young people who will be part of the families attracted to the area.

The Council's DCP caters comprehensively for a much broader set of social and community issues it should be retained and not completely replaced by each code.

ENVIRONMENTAL HEALTH AND BUILDING

Comments on Part A are provided below:

Part 2.1 Exempt Development, Pg. 17 Note 2 –It is suggested that the Food Act and the Local Government Act be referenced in this note 2. This is considered critical as certain issues would be regulated by other legislative provisions (eg non reticulated water supply to certain premises in accordance with Section 68 approvals to operate under the LGA 1993, or consideration of contaminated lands issues under SEPP 55).

Part 2.1.3 Makes reference to communication dishes, however this provision cannot be located.

Part 2.1.6 relates to air conditioning units. It is suggested that an additional requirement is included which makes reference to unreasonable amenity impacts not being permissible and noise limits relevant to background noise level. It may be the intent that such issues are regulated after installation of the device under POEO legislation, having regard for the comments under Part 2.1 Exempt Development, Pg. 17 Note 2.

Part 2.1.8 relates to Aviaries – It is suggested that this part includes a requirement that the structure not be erected closer than 1m to any registered easement, water or sewer main (this requirement could be applied to all structures, refer Water Unit comments below). An additional requirement should be included which makes reference to unreasonable amenity impacts not being permissible.

Part 2.1.15 – Bed & breakfast – Include a requirement for compliance with the Guidelines for Bed and Breakfast Operations, LGSA, Oct. 1998. Also include a requirement for notification to Council of business prior to commencement of trade, to allow for of food inspection and possibly water supply management in the case of non reticulated supply.

Part 2.1.23 – Demolition – Consideration for sub-slab contamination from termicide residues requires consideration, either prior to demolition, or prior to constructing other development on the site. Such assessment should be completed in accordance with Pre-Demolition Testing Guideline, TSC undated. Suggest that this requirement should make reference to unreasonable amenity impacts not being permissible.

Part 2.1.33 – Film Shoots – It is suggested that this part include a reference to compliance with the Food Act and that only approved food vendors participate. A notation should be provided that where event does not meet minimum requirements of the Application for

Community Events (eg maximum of 1,500 people, time restrictions etc – refer Application Form) then consent is required.

Part 2.1.63 and 2.1.64 Rainwater tanks – It is suggested that these Parts make reference to the Private Water Supply Guidelines, NSW Health May 2007.

Part 2.2.23 Pg. 51 – Demolition – Consideration should given to provide -slab contamination from termicide residues either prior to demolition, or prior to constructing other development on the site. Such assessment to be completed in accordance with Pre-Demolition Testing Guideline, TSC undated. This section should also reference to unreasonable amenity impacts not being permissible.

Part 2.2.27 - Development standards general – This section should include a reference to AS1668 exhausting of cooking gases and consideration of potential contamination of the site.

Division 2 Pg. 60 – Mechanical ventilation – It is recommended that a requirement is included to ensure compliance with AS1668.

Part 5.18 Pg. 128 – Acoustics – It is recommended that requirements are included to ensure compliance with NSW Industrial Noise Policy, NSW EPA 2000.

It is unclear how the code will trigger contaminated land assessment.

Should you require any further information regarding this letter, please contact Rowena Michel on (02) 6670 2468.

Yours faithfully

Vince Connell
DIRECTOR PLANNING AND REGULATION