

MANGO HILL INFRASTRUCTURE DEVELOPMENT CONTROL PLAN

Precinct Plan No. 042

for

**Town Centre Frame “N” Precinct -
AD-V Street Frontage**

North Lakes Development

23 November 2010

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1.0 Introduction and Statutory Context

- 1.1 The Mango Hill Infrastructure Development Control Plan (DCP) provides a process for development of land in the DCP area and for the creation of a Precinct within any part of the DCP area chosen by the Principal Developer.
- 1.2 The Principal Developer must prepare and lodge a Precinct Plan with Council for approval in accordance with the relevant provisions of the DCP.
- 1.3 This document constitutes the Precinct Plan for the **Town Centre Frame “N” Precinct –AD-V Street Frontage** (Precinct Plan).
- 1.4 The area and boundaries of this Precinct are notional only. The general location of the Precinct within the DCP Structure Plan is shown on *Figure 1 – Planning Context*. The Precinct is bounded by:
- (i) Endeavour Boulevard and Precinct 039 and Sector 039-1000 to the north;
 - (ii) Unnamed Road to the east;
 - (iii) Environmental Area outside of the DCP to the west; and
 - (iv) Balance of Town Centre Frame to the south.
- 1.5 This Precinct Plan must be read together with and in the context of the DCP.
- 1.6 The DCP, approved precinct plans and approved sector plans are to be read in conjunction with the planning scheme and Council’s local laws, policies and codes and to the extent the DCP, precinct plans and sector plans do not modify provisions of the Council’s planning scheme, local laws, policies and codes they will apply to the DCP area.
- 1.7 To the extent the provisions of the Council’s planning scheme, local laws, policies or codes are modified by the DCP, precinct plans or sector plans, then the provisions of the DCP, the precinct plans or sector plans will prevail.
- 1.8 Development in the precinct must comply with the provisions of the Precinct Plan.

2.0 DCP Interpretation

2.1 STRUCTURE PLAN

The Precinct is located within the Town Centre Frame area of the DCP as depicted on *Figure 2 – Structure Plan Context*.

Figure 3 – Precinct Plan Map and the associated text, provide a more detailed interpretation of the Structure Plan by providing information about the general location and interrelationship of structural elements such as land uses, major roads and open space for the Precinct. The Precinct Plan illustrates the generalised design intent and development layout of the Precinct in accordance with the planning framework set out in the DCP.

2.2 DESIRED ENVIRONMENTAL OUTCOMES (DEOS)

The DEOS of relevance to the Precinct are outlined in the following sections of the DCP:

- Section 5.1 (Town Centre Frame) - section 5.1.1 (a), (b) and (c) and section 5.1.2 (a), (b), (c), (d), (e), (f) and (g);
- Section 10.1 (Transport and Circulation) – section 10.1.2 (a), (b),(d), (e) and (f); and
- Section 11.1 (Environmental Protection) – section 11.1.2 (a), (c), (d) and (e).

This Precinct Plan satisfies the relevant DEOs by providing-

- (i) a range of medium density accommodation opportunities that are not provided for in the Town Centre Core, as well as a gradual transition in land use and intensity from the Town Centre Core to the edge of the Town Centre Frame, to reinforce the role of the Core;
- (ii) a high standard of urban amenity through quality siting, design and finish of buildings and structures, suitable advertising signage and extensive landscaping;
- (iii) a high level of flexibility in planning for future development within the Precinct via development which is designed to be easily adapted for a range of alternative uses as circumstances change over time;
- (iv) opportunities to diversify housing in the DCP area by allowing some mixed use development in the Precinct;
- (v) a high degree of accessibility to road networks, public transport corridors and pedestrian and cycle networks; and
- (vi) sustainable development initiatives for the management of environmental risks within the Precinct.

2.3 PLANNING INTENT

The Planning Intent of the Town Centre Frame is set out in Section 5.2 of the DCP. This Precinct is intended to provide lower density development than in other areas of the Town Centre Frame and the Town Centre Core. In order to maintain amenity and avoid conflict between uses, consideration is to be given to the transitional role of the Precinct between the predominantly commercial environment of the Town Centre Frame and the lower order residential development to the north of the Precinct.

Given the distance from the Town Centre Core and being located at the periphery of the Town Centre Frame, this area is better suited to Medium Density residential housing, similar to those found to its north and north east.

Land uses are to generally complement the uses within the Town Centre Core and should be integrated in functional and urban design terms with adjacent Precincts. The emphasis of the Precinct is to provide a range of medium density housing options. Small scale retail/commercial uses on ground floor level may be considered if such uses are compatible with the proposed built form.

This Precinct borders an Unnamed Road to the east (AD-V), which intersects with Endeavour Boulevard to the north. The planning intent of the unnamed road is dealt with below:

(i) Unnamed Major Road Frontage

The Unnamed Major Road (AD-V) forms the eastern boundary of the Precinct and provides a link between Endeavour Boulevard and the proposed Bruce Highway exit ramp and service road. Medium density residential and the possibility of small scale retail and office are envisaged.

3.0 Development, Planning and Design Principles

3.1 GENERAL FORM OF DEVELOPMENT WITHIN PRECINCT

The architecture of any development within the Precinct should be contemporary with variations in building form achieved by the use of rooflines, shading and other features. It will integrate the medium density residential accommodation types with the future commercial and community facilities in the adjacent Town Centre Frame, consistent with the DCP.

The Precinct within the transitional area of the Town Centre Frame is to provide medium density residential development which may include townhouses, duplex and triplex and apartments to a maximum of 40 units/ha (predominantly detached). Residential Development in Town Centre Frame locations will need to reinforce the urban form and streetscape of the area by addressing the street frontage and providing a formal edge to important streets.

The Precinct will provide one Village Park in the Precinct and at least one Local Park. It is noted that a Parks located outside the Precinct will supplement the Precinct’s local open space facilities. Consequently, it is considered that Village Park and Local Park facilities will be located within 400 metres and 200 metres, respectively, of most residents.

Consistent with the DCP, it is important that flexibility be maintained in order to enable future planning to respond to changing requirements of the community and the marketplace. Unless otherwise explicit in the Precinct Plan’s text, the Precinct Plan does not necessarily define the final nature or location of specific land uses, nor does it show the final location and extent of road networks.

3.2 MAJOR ROAD FRONTAGE – UNNAMED ROAD (AD-V)

The Mason Street is to be characterised by its traffic role serving as a link between Endeavour Boulevard and the proposed Bruce Highway exit ramp and service road. The through-route nature of the Unnamed Major Road (AD-V) is to be emphasised through street treatments including the use of open landscaping along the verges and median strips, which allow visual exposure of the buildings from the road.

The Unnamed Major Road (AD-V) is anticipated to be a high traffic road but consistent with the general amenity and safety standards expected in an urban area. Access to this Precinct will be via a signalised intersection of North Lakes Drive servicing this Precinct and potential future residential land to the west. No direct vehicular access is proposed from Unnamed Road (AD-V).

Pedestrian safety is to be paramount through the use of paving treatments to define and encourage the use of pedestrian movement areas.

4.0 Landscape Concept

4.1 LANDSCAPE CONCEPT PLAN MAP

Figure 4 – Landscape Concept Plan provides a diagrammatic framework for the creation of a distinctive urban setting and character for the Precinct.

4.2 CONCEPT OVERVIEW

The landscape concept for this Precinct can generally be described as having an informal planting character, incorporating distinctive key character elements already established in the DCP area. These key character elements include predominantly native planting and the use of natural materials such as stone and wood within the landscape and streetscape elements.

The streetscape character of the Precinct should reflect the through-route nature of Mason Street and the changes in land-use, character and traffic level between the balance of the Town Centre Frame and the residential development to the north across Endeavour Boulevard.

Landscaping within the Precinct should be used to soften the edge of built form and enhance residential amenity.

All pedestrian areas and paths must be provided with a safe level of lighting.

Footpath paving treatments within the road reserve are to achieve a consistent theme between adjacent and surrounding development and require continuity of materials and elements while permitting easy and even-surfaces for desirable walking conditions for pedestrians.

Open Space provisions within the precinct will form part of the comprehensive and integrated system of open space planned for the DCP area, fulfilling aesthetic, recreation and environmental management needs. The principal spatial elements or key elements or key areas of the Landscape Concept Plan for the precinct are illustrated on Figure 6 and summarised as follows:

- *Village and Local Parks:* Active and passive recreation areas are placed at convenient locations across the precinct to serve the needs of local residents in accordance with residential planning principles outlined in the DCP.
- *Street Planting:* Streetscape treatments of major roads and local streets creating a cohesive and positive impression of the development, with selection of plant materials for roadways based on aesthetic, practical, maintenance and safety considerations, and the intended scale and characteristics of each road. In particular street planting will provide a meaningful way of reinforcing different road types in the road hierarchy.

The final location and size of the various park elements will be determined at the sector plan stage. The landscape treatment of these areas will be planned in such a way that their different roles, natural features and locational characteristics will be recognised and enhanced.

The Landscape Concept Plan promotes the planting of predominately native species to reflect the original natural setting of the DCP area. This planting strategy will establish a landscape framework which enhances habitat values, reduces maintenance and water

requirements, influences the built form in terms of visual integration and creates a landscaped environment for residents and visitors. Exotic and flowering species may be used primarily for special colour accents at significant entry points or as feature planting within parks. The landscape planning will also include enhancement of major roads adjacent to the precinct with the planting of trees and provision of acoustic mounds and/or fence to establish an attractive visual and acoustic buffer and to enhance the amenity of residential development.

4.2.1 Frontage to the Unnamed Road

The streetscape and planting theme fronting the Unnamed Road to the east and south should be distinct from other streets within the Town Centre Frame. Streetscape treatments and landscaping should clearly indicate the through-route nature of this road and give views to the parking entrances of development.

Landscaping is to include planting along the median strip of the unnamed major road and along the verges. Landscaping should reflect the major traffic role and function of the road, filter the impacts of the anticipated traffic flows and recognise the transition in development scale and intensity between the predominantly commercial environment of the Town Centre Frame, the residential development to the north of the Precinct and the transition through to connect with the Bruce Highway.

Landscaping may be required to buffer and screen functional elements including noise attenuation along these frontages to reduce impacts upon the amenity and visual character of the Precinct.

Landscaping at the corner of Endeavour Boulevard and the Unnamed Major Road should reflect the importance of this intersection as the western entry to the North Lakes Town Centre.

4.2.2 Pedestrian Linkages

Where pedestrian links are identified as serving an overall purpose to assist pedestrian connectivity, provision is to be made to create an interconnected landscaped, open space and pedestrian system.

Subsequent Sector Plan(s) and applications for Material Change of Use will specify how this shall occur in particular circumstances but it may be for example, by common pedestrian pavement surfaces, special treatment of roadway surfaces, or a particular integrated style of landscaping for pedestrian legibility.

4.2.5

4.2.3 Landscape Buffer Planting

Unightly functional elements, including loading docks, waste storage, collection areas and plant and building services areas require appropriate screening measures. These should be incorporated into overall building design and integrated with appropriate landscaping.

5.0 Environmental Management

The following objectives and performance criteria provide a summary of the environmental issues that will need to be considered as part of the detailed planning and design for development within the Precinct, particularly at the Sector Plan stage.

5.1 ENVIRONMENTAL MANAGEMENT OBJECTIVES

5.1.1 Objectives

- (i) To encourage energy efficiency in order to minimise greenhouse gas generation;
- (ii) To encourage development which incorporates environmentally sustainable initiatives; and
- (iii) To manage and mitigate environmental risk.

5.1.2 Performance Indicators

For all development within this Precinct, environmental management during the design phase, construction and post-construction phases, should:

- (i) implement energy efficient design elements in buildings, including overall building design, building orientation to maximise use of positive climatic conditions such as access to sunlight and prevailing breezes, shading including overhangs, skylights and non-reflective materials, building materials and mechanical and electrical plants to improve energy efficiency;
- (ii) implement building energy management systems which contribute to overall building energy efficiency;
- (iii) adopt effective air pollution mitigation measures to comply with the Environmental Protection Act, Environmental Protection Policy (Air) and other relevant legislation in relation to dust, smoke, fumes and gases, where necessary;
- (iv) ensure construction activities comply with Council’s Policy LP32;
- (v) implement effective noise mitigation measures to comply with the Environmental Protection Act, Environmental Protection Policy (Noise) and other relevant legislation where necessary;
- (vi) ensure high levels of environmental quality are achieved through water management for example in the maintenance of landscaped areas;
- (vii) ensure noise generated from development is reasonable for the type of use;
- (viii) ensure buildings used for purposes that require low noise intrusion, including residential uses, are designed to adequately ameliorate noise from external sources within and external to the Precinct;
- (ix) implement suitable waste storage and disposal measures in accordance with Council regulations;

- (x) implement design elements and buffer treatments to control the obtrusive effects of outdoor lighting where it is likely to adversely affect residential amenity and traffic safety;
- (xi) implement management and maintenance actions in accordance with Best Management Practice to minimise site-generated dirt/mud on public roads, particularly after rain periods; and
- (xii) ensure environmental management structures or control devices, such as gross pollutant traps, waste disposal bins, flues and the like, do not detract from the overall visual character of the Town Centre Frame or the immediate locality.

5.2.1 STORMWATER MANAGEMENT OBJECTIVES

To manage the quality and quantity of stormwater within and from the Precinct so as not to cause a nuisance or annoyance to any person, prevent erosion and flooding, maximise soil infiltration and minimise overland flow.

5.2.2 Performance Indicators

Implement management systems which seek to control the quality and quantity of surface water in compliance with the:

- (i) *Environmental Protection Act 1994* and the *Environmental Protection Policy (Water)* and other relevant legislation;
- (ii) Planning Scheme, Local Laws, the Design Manual and policies except where Clause 2.6 of the Mango Hill Infrastructure Agreement applies;
- (iii) Mango Hill Infrastructure Agreement;
- (iv) Performance objectives of both the Freshwater Creek Catchment Management Plan and the Saltwater Creek Catchment Management Plan;
- (v) Stormwater Management Plan for Freshwater Creek; and
- (vi) Stormwater Management Plan for Tributary C.

5.3.1 NOISE OBJECTIVES

To ensure noise generated is not unreasonable.

5.3.2 Performance Indicators

- (i) Noise generated from development is reasonable as provided by the Environmental Protection Policy (EPP) Noise.
- (ii) Noise generated from development which is unreasonable is abated as required by EPP (Noise).
- (iii) During construction of the precinct, infrastructure complaints in excess of one per week may indicate unacceptable work practices. For the purpose of this clause, a complaint is one resulting in the issue of a noise abatement notice under EPP (Noise).

- (iv) Provision of traffic noise amelioration in accordance with Council Policy LP25.

5.4.1 EARTHWORKS MANAGEMENT OBJECTIVES

To adopt appropriate environmental management practices to avoid, or mitigate and manage, the potential adverse affects of earthworks and related land development activities.

5.4.2 Performance Indicators

For all development within this Precinct, earthworks management during construction and post-construction should:

- (i) identify the extent of acceptable earthworks activities consistent with the protection of overall environmental values and prepare designs complying with these limitations;
- (ii) implement appropriate soil erosion and sediment control protection measures and monitor and maintain these;
- (iii) manage the excavation and reshaping (bulk earthworks) to establish a finished surface profile that seeks to minimise the environmental impact of the earthworks on the surrounding environment; and
- (iv) comply with the Environmental Protection Act 1994, Environmental Protection Policies and other relevant legislation, as necessary.

6.0 Generic Land Uses

As required by Section 2.3.2 (f) of the DCP, the intended desirable and undesirable generic land uses for the Precinct are:

6.1 DESIRABLE LAND USES

- (i) car park;
- (ii) commercial services;
- (iii) office;
- (iv) medium density residential;
- (v) mixed use development;
- (vi) recreation and leisure facilities;
- (vii) restaurant and café; and
- (viii) retail (small scale).

6.2 UNDESIRABLE LAND USES

- (i) recycling depot where not associated with an existing building.

7.0 Infrastructure

7.1 INFRASTRUCTURE TO BE PROVIDED

The following infrastructure is to be provided in the Precinct in accordance with the Mango Hill Infrastructure Agreement (MHIA), the Mango Hill Infrastructure Agreement – Main Roads (MHIA-MR), the Mango Hill Infrastructure Agreement (Queensland Transport) and the rezoning conditions.

7.1.1 Roads

- (i) All internal public roads; and
 - (ii) Pathways and bikeways.
- (refer to *Figure 5 – Road Layout*)

7.1.2 Water Supply

- (i) Reticulation systems along all internal roads to service all properties in the Precinct;
- (ii) Those sections of the mains shown on *Figure 6 – Water Supply Headworks*, necessary to service the anticipated demand in the Precinct; and
- (iii) Water headworks contributions.

7.1.3 Sewerage

- (i) Trunk gravity main from the existing Council sewerage infrastructure to connect with each lot in the Precinct as shown on *Figure 7 – Sewerage Headworks*; and
- (ii) Sewerage headworks contributions.

7.1.4 Stormwater

- (i) Stormwater management works progressively in accordance with the Stormwater Management Plan for Tributary C and the Stormwater Management Plan for Freshwater Creek as approved by Council; and
- (ii) Stormwater drainage systems to roads and lots.

7.1.5 Open Space

Provide open space for the purposes of a detention basin in accordance with *Figure 3 – Precinct Plan Map*.

7.1.6 Electricity Supply and Communications

- (i) Allow for underground electricity distribution to all properties within the Precinct, by Energex or another appropriate supplier of electricity; and
- (ii) Arrange for the provision of underground conduits along all road verges within the Precinct and adjacent roads to meet the anticipated demands of the DCP area.

7.2 INFRASTRUCTURE AFFECTED OR REQUIRED BY PRECINCT DEVELOPMENT

- (i) The development of the Precinct may place demands on the following infrastructure:
 - Roads external to the DCP area and the Precinct;
 - Water supply infrastructure;
 - Sewerage infrastructure;
 - Stormwater infrastructure;
 - Parks;
 - Community facilities;
 - Electricity and gas supply;
 - Communications systems; and
 - State Government Infrastructure.
- (ii) The infrastructure described in clause 7.1 above, together with the obligations of the Principal Developer under infrastructure agreements will mitigate the adverse affects on the above infrastructure.

7.3 HOW THE REQUIRED INFRASTRUCTURE RELATES TO THE INFRASTRUCTURE AGREEMENTS

The infrastructure agreements describe the infrastructure that must be provided by the Principal Developer as part of its obligations to provide infrastructure, as envisaged by Chapter 12 of the DCP. The works described in clause 7.1 of this document are the Principal Developer's obligations under the rezoning conditions and the infrastructure agreements.

8.0 Preliminary Infrastructure Program

8.1 PRELIMINARY PROGRAM FOR INFRASTRUCTURE PROVISION

- (i) The Principal Developer will provide the entire infrastructure referred to in clause 7.1 of this document at times to satisfy the requirements of the MHIA. Initial infrastructure works are estimated to be constructed by December 2010;
- (ii) The local bus service will be provided in accordance with clause 8.2 (i) of this document; and
- (iii) The public transport interchange and provision of land for park and ride facilities within the Town Centre Frame will be provided in accordance with clause 8.2 (ii) of this document.

8.2 INFRASTRUCTURE TO BE PROVIDED AND THE INTENDED PROVIDER

The following items of State Government infrastructure are to be provided by the Principal Developer in conjunction with the development of the Precinct in accordance with Infrastructure Agreements with the State Government. These include the provision of works to State-Controlled Roads.

- (i) A local bus service will service the Precinct in accordance with the Infrastructure Agreement with Queensland Transport;
- (ii) The Principal Developer must contribute towards the cost of providing kerbside infrastructure associated with the public transport system. Such contribution is to be in accordance with the Infrastructure Agreement with the State Government.

8.3 OTHER WORKS DEPENDENT ON INFRASTRUCTURE PROVISION

There are no other works necessary to ensure the infrastructure required to service the development of this Precinct is provided.

8.4 ESTIMATES OF WHEN OTHER WORKS DEPENDENT ON INFRASTRUCTURE PROVISION WILL NEED TO BE PROVIDED

Not applicable – refer to Section 8.3 above.

8.5 OTHER RELEVANT INFORMATION

8.5.1 Estimated Water and Sewerage Demands

As required by the MHIA, the Principal Developer states as follows:

- (i) For the purpose of assessing water supply capacity, the estimated number of equivalent Tenements for this Precinct is 97.5 ET; and
- (ii) For the purpose of assessing sewerage capacity, the estimated number of Equivalent Persons for this Precinct is 398.19 EP.