City of Coquitlam

Lower Hyde Creek Village Neighbourhood Plan

Section 11.1

Adopted July 05, 2004 - Bylaw No. 3641, 2004 Amended May 29, 2006 - Bylaw No. 3751, 2006 Amended July 31, 2006 - Bylaw No. 3763, 2006 Amended March 7, 2007 - Bylaw No. 3829, 2007 Amended March 18, 2013 - Bylaw No. 4295, 2013 Amended July 27, 2015 - Bylaw No. 4575, 2015 Amended July 27, 2015 - Bylaw No. 4576, 2015 Doc# 267032

LOWER HYDE CREEK VILLAGE NEIGHBOURHOOD PLAN

TABLE OF CONTENTS

1. OVERVIEW

- 1.1 Planning Framework for Managing Change
- 1.2 Relationship to the Citywide Official Community Plan and the Northeast Coquitlam Area Plan
- 1.3 Relationship to Hyde Creek Integrated Watershed Management Plan

2. VISION

2.1 Planning Principles

3. LAND USE ELEMENTS

- 3.1 ENVIRONMENT
 - 3.1.1 Environmentally Sensitive Areas
 - 3.1.2 Watercourse Protection
 - 3.1.3 Low Impact Development
- 3.2 RESIDENTIAL
 - 3.2.1 Large Village Single Family
 - 3.2.2 Small Village Single Family
 - 3.2.3 Street-Oriented Village Homes
- 3.3 NEIGHBOURHOOD COMMERCIAL
- 3.4 PARKS AND OPEN SPACE
- 3.5 SCHOOL/PARK SITE

LOWER HYDE CREEK VILLAGE NEIGHBOURHOOD PLAN

TABLE OF CONTENTS

4. SERVICING COMPONENTS

4.1 TRANSPORTATION

- 4.1.1 Street Network
- 4.1.2 Cycling Network
- 4.1.3 Pedestrian Network
- 4.1.4 Transit Network

4.2 UTILITIES

- 4.2.1 Water Distribution
- 4.2.2 Sanitary Sewer
- 4.2.3 Stormwater Management

5. DEVELOPMENT PERMIT AREAS

SCHEDULES

Schedule A Land Use Designation

Schedule B Parks and Open Space Concept Plan

Schedule C Stream Classification

ATTACHMENTS

Figure 1 Roads Concept Plan

Figure 2 Water Servicing Concept Plan

Figure 3 Sanitary Servicing Concept Plan

Figure 4 Stormwater Servicing Concept Plan

1. OVERVIEW

1.1 Planning Framework for Managing Change

The Lower Hyde Creek Village Neighbourhood is located along the eastern flank of Hyde Creek, and is bounded by three major roads; to the north by David Avenue, the south by Victoria Drive and the east by Soball Street in Northeast Coquitlam. The neighbourhood is among the first in Northeast Coquitlam to be planned, serviced and accessed from the City's Town Centre. It will also be among the first neighbourhoods in the City to be shaped directly by a watershed management plan. As such, the Lower Hyde Creek Village Neighbourhood Plan (LHCVNP) represents a valuable opportunity to promote and incorporate alternative community design strategies so as to set a high standard of urban development on Burke Mountain.

The LHCVNP is a comprehensive land use and servicing plan that will guide the future rezoning and development of lands originally designated "Neighbourhood C" in the Northeast Coquitlam Area Plan (NECAP Schedule "C"). In the preparation of the LHCVNP, particular guidance was provided by the Neighbourhood Plan Policies of NECAP which include land use and community design principles and transportation and circulation guidelines.

1.2 Relationship to the Citywide Official Community Plan (CWOCP) and the Northeast Coquitlam Area Plan (NECAP)

Area and Neighbourhood Plans are an integral part of the CWOCP, which is a legal document with the force and effect of a Bylaw adopted by Council. NECAP provides the land use and policy framework for the Lower Hyde Creek Village Neighbourhood Plan (LHCVNP). While CWOCP - NECAP policies continue to apply throughout the Northeast Coquitlam plan area, the LHCVNP details land use designations and policies at the neighbourhood level. For convenience and ease of use, the LHCVNP cross-references a number of NECAP policies in various sections, however, this does not limit the force and effect of any other NECAP policy that should apply.

1. OVERVIEW cont'd/

1.3 Relationship to the Hyde Creek Integrated Watershed Management Plan (HCIWMP)

The CWOCP explains the relationship between integrated watershed management plans and neighbourhood plans as follows:

- New neighbourhood plans are to be completed after applicable watershed studies;
- Watershed study results are to be responded to with appropriate land use and development permit area designations in neighbourhood plans; and
- Each new neighbourhood plan must include a stormwater management component.

Accordingly, the LHCVNP has integrated the HCIWMP study results as directed by the CWOCP. Land use designations for Environmentally Sensitive Areas and development permit areas recognize the importance of watercourses as valuable fish and wildlife habitat and integral to Coquitlam's drainage and flood control systems. The stormwater servicing concept plan follows the HCIWMP directions for flood control, stormwater management, water quality control, sediment and erosion control, and maintenance of pre-development flows. In addition, low-impact development measures for reducing effective impervious area in the watershed, as identified in the HCIWMP are proposed to be implemented throughout the neighbourhood.

Environmental protection policies are outlined in Section 3.1 while Section 4.2.3 addresses stormwater management.

2. VISION

The planning concept for the Lower Hyde Creek Village area is founded on land use and community design principles as well as transportation and circulation guidelines within NECAP (Policies D-1.0 and D-2.0). These principles promote neighbourhood design which integrates natural features and systems to create a sense of place and community that is respectful of its natural environment. The neighbourhood is compact with a mix of land uses, household types and building forms arranged for convenient access by walking, cycling, transit or car. Such a form preserves open space and environmentally sensitive areas. The public realm is treated as a civic space that is friendly to pedestrians, and is integrated as a network of public spaces and facilities, including parks, schools, walkways, natural vistas and corridors, trails and transit stops.

2.1 Planning Principles

In summary, the LHCVNP is based on the following planning principles aimed at creating a complete community:

a. To design compact pedestrian-oriented neighbourhoods, providing:

- a coherent pattern of streets and uses;
- improved accessibility, safety and pedestrian comfort; and,
- slowed vehicular traffic.

b. To foster socio-economic and age mixed communities, by providing:

- a variety of housing types to meet diverse needs, including age, ability and income; and,
- services for a diversity of life-stages.

c. To protect environmental health, through:

- protection of environmentally sensitive areas;
- restoration and enhancement of sensitive habitats; and,
- stewardship of natural and cultural resources.

d. To integrate parks and the natural environment, by:

- designing the neighbourhood around primary natural features;
- locating parks within an average five-minute walking distance of residents;
- connecting parks and natural areas in a network of civic spaces; and,
- providing for public enjoyment of the Hyde Creek corridor.

2. VISION cont'd/

2.1 Planning Principles cont'd/

e. To situate a combined secondary and middle school site and community park site such that it provides:

- a suitable gateway to Northeast Coquitlam along David Avenue;
- a prominent and attractive anchor at the western terminus of the community promenade intersecting at Soball Street;
- convenient access for students and other residents in the Northeast Coquitlam planning area;
- limited traffic impacts within the LHCVNP; and,
- opportunities for active and passive play and interpretive activities.

f. To develop the lands near the existing elementary school and park site to provide:

- access to households within a five-minute walking distance;
- opportunities for passive surveillance and for increased safety; and,
- opportunities for active and passive play and interpretive activities.

g. To increase transportation choices, providing:

- a connected multi-modal transportation system; and,
- a network of dedicated pedestrian and cycling routes.

3. LAND USE ELEMENTS

The land use designations outlined in **Schedule A – Land Use Designation** provide a framework for the coordinated and sustainable long-term redevelopment of the Lower Hyde Creek Village area. This sub-section describes the land use designations integral to the Plan, identifies their general location and densities, and presents development rationale and policies within the context of the larger neighbourhood.

Descriptions for other land use elements that are not described below are detailed in CWOCP Chapter 9 – Northeast Coquitlam Area Plan, Part B, Policy A-1.0 titled Land Use Designations.

3.1 ENVIRONMENT

Watercourses and vegetation within the LHCVNP area provide important aquatic and wildlife habitat. Hyde Creek and its tributaries, including the east and west branches of Watkins Creek, are the major salmon bearing watercourses. Riparian corridors associated with these watercourses also have the potential to support blue- and red-listed wildlife species. The Neighbourhood Plan takes an approach to protect and enhance natural habitat that respects the objectives and findings of the HCIWMP, and the sound environmental policies already provided in the NECAP. In this manner, watercourse and environmentally sensitive area protection measures, land use planning, parks and open space designations, and stormwater management strategies have all been designed to respect the aquatic and wildlife values found in this part of the Hyde Creek watershed.

3.1 ENVIRONMENT cont'd/

3.1.1 Environmentally Sensitive Areas (ESAs)

The Hyde Creek IWMP included an environmental study, which had as its main focus aquatic life and aquatic habitat. The Northeast Coquitlam Environmental Assessment (Catherine Berris, 1995) provided a more complete examination of ESAs, and provided the foundation for the overall land use plan in NECAP, including the Environmentally Sensitive Area land use designation. This land use designation is carried through on Schedule A of the neighbourhood plan, with an additional location identified through the more detailed neighbourhood plan environmental study and stream classification work. The additional location includes the areas within the top-of-bank of the east branch of Watkins Creek below the David Avenue corridor. The neighbourhood plan environmental study also concluded that sensitive fish and wildlife habitat, potentially supporting red- and blue-listed species, exists along sections of Hyde and Watkins Creeks.

- 1. Consistent with the Environmentally Sensitive Area (ESA) designations in NECAP, include the areas within the top of bank of East Watkins Creek below the David Avenue corridor in the ESA locations shown in Schedule A.
- 2. The following NECAP policies have particular relevance to ESAs:
 - Watercourse Protection Development Permit Area (Policy A-9.7);
 - Tree Protection and Management (Policy A-9.15).
- 3. Continue to limit human activity within ESAs to maintain the integrity of the natural environment and preserve their function as wildlife habitat and movement corridors.
- 4. Continue to transfer ESAs to public ownership through the subdivision and development approval process.
- 5. Extend the functional benefit of ESAs by locating parks and open spaces contiguously wherever possible and through the use of vegetated riparian setbacks beyond the top of bank of watercourses.

3.1 ENVIRONMENT cont'd/

3.1.2 Watercourse Protection

The City employs existing Development Permit Areas with watercourse protection policies in the NECAP (Policy A-9.7 and A-9.8) which apply in the LHCVNP area. The application of these policies will be assisted by Schedule C, Stream Classification, which identifies known watercourses in the area by fish-bearing and flow permanency characteristics. This map will be used as a guide during development application review and will be supplemented as necessary with additional studies as outlined in the NECAP policies. Aquatic habitat enhancement efforts will be guided by Coquitlam's Hyde Creek Watershed Habitat Enhancement Opportunities Strategy which lists in-stream and riparian fish habitat limitations that present opportunities for enhancement. This list may be updated to reflect neighbourhood-specific opportunities.

Policies¹

- 1. The Development Permit Area and guidelines for watercourse protection purposes as established in Part 4 of the CWOCP applies to the LHCVNP area and Schedule C, Stream Classification, supplements Schedule D of the NECAP.
- Update and prioritize habitat restoration and enhancement opportunities available in the LHCVNP area in the Hyde Creek Watershed Habitat Enhancement Opportunities Strategy.
- 3. Pursue habitat restoration and enhancement measures with land development in accordance with the implementation strategy outlined in the Hyde Creek Watershed Habitat Enhancement Opportunities Strategy.

3.1.3 Low Impact Development

The HCIWMP work identified the benefits of implementing Low Impact Development (LID) measures, to:

- Reduce effective impervious area (EIA) as a priority for watershed health; and
- Complement the major stormwater management facilities that maintain pre-development flows.

The HCIWMP analysis also emphasized the role of evapotranspiration (retention and cycling of rain water by tree and vegetative cover) given the dense till soil layer which precludes intensive or community infiltration. Therefore, policies to achieve post-development tree and vegetative cover are prudent and will also support livability and watershed functions including rainfall interception, greenhouse gas reductions, air quality improvements, biodiversity, aesthetic benefits, energy savings and attractive pedestrian environments.

11.1-7 CITY OF COQUITLAM LOWER HYDE CREEK VILLAGE NEIGHBOURHOOD PLAN

3.1.3 Low Impact Development cont'd/

To this end, the findings of the Comprehensive Landscape Strategy can assist in determining landscape requirements such as the optimal type and percentage of tree cover for community and environmental health. In addition, the NECAP identifies the use of the City's Guide to Best Site Development Practices (Policy A-2.2.10) to achieve slope-adaptive development and the retention of significant trees and natural features where it is safe and practical to do so¹.

Accordingly, the LHCNVP includes the following policies to ensure Low Impact Development on both private and public property.

- 1. Amend the Stormwater Management Policy and Design Manual to include LID measures as recommended in the HCIWMP for both private and public property.
- 2. Based on the Comprehensive Landscape Strategy findings for optimal tree cover in the plan area, determine planting requirements for private and public property, and:
 - establish the optimal tree cover target to be achieved post-development on private and public property;
 - amend the Subdivision and Development Servicing Bylaw Supplementary Specifications for boulevard trees to include suitable street tree species, size at planting, and Best Management Practices for planting and maintenance requirements;
 - include target tree planting requirements in all zones used in the LHCNVP area that will achieve the optimal tree cover target post-development.
- 3. Continue to seek opportunities to retain existing tree cover where possible through the subdivision and development permit approval process.
- 4. Promote responsible landscape maintenance and conservation practices on private property through leadership by example in parks and open spaces, as well as through awareness programs in partnership with local stewardship groups and educational institutions.
- 5. Use the NECAP policy (A-2.2.10) and Guide to Best Site Development Practices to:
 - achieve development suitable to hillside conditions, and retain significant natural features where safe and practical; and
 - support public interest in and voluntary stewardship for conservation and enhancement efforts.¹
- 6. Encourage the use of LEED (Leadership in Energy and Environmental Design) standards in public and private projects as complementary to the LID approaches described above.

3.2 RESIDENTIAL

The LHCVNP responds to a growing regional demand for mid-density housing forms and takes advantage of the opportunity provided by those densities to promote walking, cycling, and transit. Thus, residential development is organized around a more intensive core area near the existing elementary school and neighbourhood park sites. Intensive residential development is also concentrated along the central transportation axis of Coast Meridian Road. Residential development is linked by a network of multiple road, path and trail connections throughout the neighbourhood. It is expected that the Lower Hyde Creek Village Neighbourhood will accommodate approximately a total of 530 residential units, or approximately 7 percent of the City's overall development capacity in the NECAP area.

LHCVNP Schedule A - Land Use Designation establishes an overall development pattern that is generally aligned with the residential housing objectives and targets assigned to 'Neighbourhood C' (NECAP Schedule C).

The proposed residential housing mix for the Lower Hyde Creek Village is outlined below:

Proposed Residential Land Use	LHCVNP	
	%	Units
Large Village Single Family	40	214
Small Village Single Family	22	118
Street-Oriented Village Homes	38	199
Total	100	531

Table 1- Residential Development Mix

Policies

General residential policies applicable to all residential land uses in the LHCVNP include:

- Ensure that residential development addresses the vision outlined in the LHCVNP Section 3 and that future development is compatible with LHCVNP policies outlined herein.
- 2. Encourage the development of a walkable neighbourhood with a variety of streetoriented housing forms and lot sizes that meets the needs of households of varying income levels and age groups within the neighbourhood.

3.2 RESIDENTIAL cont'd/

Policies cont'd/

- 3. Apply Hillside Residential Development Guidelines to ensure that future residential development is suited to the hillside condition of Burke Mountain and is sensitive to natural features, terrain, vegetation and scenic views while ensuring a distinctive residential character.
- 4. Front homes directly onto neighbourhood parks where possible and practical to encourage passive surveillance and security for these public spaces.
- 5. Require new development to respect, integrate and contribute to the character of neighbourhood parks through appropriate siting and design which responds positively to parks and the natural environment.
- 6. Ensure that residential development positively contributes to the public realm by promoting livability and a sense of community in new residential areas; make streets comfortable civic spaces with front doors and porches facing streets.
- 7. Use amenity contributions to enhance the neighbourhood as a complete community (e.g. daycare needs to supplement elementary school daycare services).
- 8. The following Northeast Coquitlam Area Plan (NECAP) policies have particular relevance to residential development in the LHCVNP area:
 - Siting of Residential Structures (Policy A-2.2.7);
 - Building Design and Site Planning Strategies (Policy A-3.1 a), iv));
 - Location of P-4 Daycare Centres (Policy A-7.4);
 - Location of Places of Worship (Policy A-7.5);
 - Development on Steep Slopes (Policy A-9.13);
 - Tree Protection and Management (Policy A-9.15); and
 - Land Use and Community Design Principles (Policy D-1.0 h) and i)).

3.2 RESIDENTIAL cont'd/

3.2.1 Large Village Single Family

Description and Rationale

The Large Village Single Family designation accommodates average densities of 20 units per hectare (8 upa). Large Village Single Family lots provide a mid-density housing form and occupy roughly one-half of the residential land area in the neighbourhood.

- 1. Accommodate Large Village Single Family uses on the north side of Mason Avenue south of the BC Hydro right-of-way, west of Soball Street and east of the intensive residential development near the intersection of Coast Meridian Road and Mason Avenue; north and west of the BC Hydro right-of-way west of Soball Street and south of the secondary and middle school and park site; east of Hyde Creek, north of Victoria Drive and south of David Avenue, and located on the west side of Coast Meridian Road (north of the proposed park site), and west of the proposed intensive residential development generally situated between Mason Avenue on the north and Victoria Drive on the south according to LHCVNP Schedule A.
- 2. Although rear lane access to Large Village Single Family residences is encouraged, front-loaded street access may be provided where site development constraints such as steep topography, natural features, environmentally sensitive areas, and/or parcel size or configuration would limit vehicular access options¹.
- 3. For front loaded Large Village Single Family residences, require the living area of homes to be sited closer to the street in order to establish a well-defined streetscape where dwellings rather than garages maintain a dominant visual presence.
- 4. For front-loaded Large Village Single Family residences, promote shared access between adjacent residences to minimize the visual impact of driveways and the number of driveway crossings impeding the pedestrian environment.
- 5. Minimize the extent of the front facade occupied by garage doors.

3.2 RESIDENTIAL cont'd/

3.2.2 Small Village Single Family

Description and Rationale

The Small Village Single Family land use designation provides a choice for households who desire a more compact one- and, in specific circumstances, two-family housing option (average densities of 25 units per hectare)¹. Small Village Single Family uses are situated in close proximity to local neighbourhood amenities, around focal points of parks and school sites, as well as the Watkins Creek watercourse.

- 1. Accommodate Small Village Single Family homes in higher density nodes within the neighbourhood centre, near parks, schools and main neighbourhood streets according to LHCVNP Schedule A.
- 2. Recognizing that Small Village Single Family residences are a compact housing form, ensure that subdivision proposals include required setbacks, housing form and landscaping which contribute to well defined attractive streetscapes.
- 3. Although rear lane access to Small Village Single Family residences is encouraged, front-loaded street access may be provided where site development constraints such as steep topography, natural features, environmentally sensitive areas, and/or parcel size or configuration would limit vehicular access options².

3.2 RESIDENTIAL cont'd/

3.2.3 Street-Oriented Village Homes

Description and Rationale

The Street-Oriented Village Homes designation is intended to provide a ground-oriented, attached housing option within the neighbourhood. Contributing to a mix of compact housing types to foster community diversity, Street-Oriented Village Homes front directly onto public streets, and have street-oriented entrances with private rear yard areas. In most instances, vehicular access is provided from the rear lane, where tandem or paired parking arrangements may be employed. Average densities for Street-Oriented Village Homes are around 37 units per hectare.

- Accommodate Street-Oriented Village Homes along the east side of Coast Meridian Road north of Mason Avenue and south of the commercial site near the intersection with David Avenue; along Roxton Avenue west of Soball Street and east of Watkins Creek; and, in the area generally located west of Coast Meridian Road south of Mason Avenue and north of Darwin Avenue that adjoins the lands designated Large Village Single Family according to LHCVNP Schedule A.
- 2. Require all development within the Street-Oriented Village Home designation to obtain a Development Permit as outlined in Part 4 of the CWOCP.
- 3. Ensure that the design of Street-Oriented Village Homes contributes to a unified streetscape and provides ground-oriented units with direct access from the street.
- 4. Ensure that individual units, their entries, and private outdoor spaces are designed to maximize privacy and clearly delineate private and public spaces.
- 5. Street-Oriented Village Homes require access from the rear.
- 6. Consider reducing on-site parking requirements by up to 30 percent as part of development within the Lower Hyde Creek Village Development Permit Area if justified through the demonstration of lower automobile ownership, shared parking opportunities and other long-term incentives for occupants.

3.3 NEIGHBOURHOOD COMMERCIAL

Description and Rationale

A Neighbourhood Commercial site is located at the southeast corner of the intersection of David Avenue and Coast Meridian Road. This commercial node is intended to directly serve the residents of the Lower and the Upper Hyde Creek Village Neighbourhoods. In addition, the Neighbourhood Commercial site will serve students attending the secondary school located along David Avenue and Soball Street. The neighbourhood commercial development located at the corner of David Avenue and Coast Meridian Road must accommodate the needs of neighbourhood residents and students including pedestrians, cyclists, transit users and motorists.

- Accommodate Neighbourhood Commercial development at the southeast corner of the intersection of David Avenue and Coast Meridian Road according to LHCVNP Schedule A.
- 2. Allow a mix of general commercial, office, retail and community meeting space uses within the Neighbourhood Commercial development at the subject site to cater to the needs of neighbourhood residents.
- 3. To ensure commercial development which is compatible with the gateway location and neighbourhood character, require a design covenant to be registered at subdivision.
- 4. Limit vehicular access to the site to right-in/right-out from David Avenue, but make provision for access from Coast Meridian Road to both the commercial site and the park area to the east.
- 5. Require that a traffic study be undertaken to determine preferred on and off-site traffic design and operational requirements

3.4 PARKS AND OPEN SPACE

Description and Rationale

The LHCVNP establishes a network of neighbourhood parks, open spaces and trails within an average five-minute walk of local residences to provide the community with active and passive recreational opportunities (Schedule B – Park and Open Space Concept Plan). Three distinct parks are established as focal points in the community, including two neighbourhood parks and the joint secondary and middle school and park. Policies for the joint school/park are outlined in Section 3.5.

LHCVNP residential policies promote the fronting of homes directly onto neighbouring parks where appropriate to encourage passive surveillance and security for these public spaces.

LHCVNP residential policies also require new development to respect, integrate, and contribute to the character of neighbourhood parks and to respond positively to the park environment.

Proposed park designations and areas are summarized in the following table.

Table 2 – Park Program Summary:

Park	Designated Function	Gross Area	
		ha	ac
Joint Secondary School and Middle School/Park	Active recreation and passive open space with direct links to neighbourhood trail system	3.6	9.0
Centre Neighbourhood Park	Active recreation and passive open space with trails	0.8	2.0
Lower Neighbourhood Park (existing)	Active recreation and passive open space includes a connection to Leigh Elementary School site	1.8	4.5
Total		6.2	15.5

3.4 PARKS AND OPEN SPACE cont'd/

Policies

Park and Open Space Concept

- 1. Secure parks and open spaces in accordance with Schedule B Park and Open Space Concept Plan.
- 2. Provide, as a minimum, land for park space as outlined in Table 2.
- 3. Link neighbourhood parks, open spaces, and key destinations through a continuous system of sidewalks, path-ways, off-road trails, trailheads and park connectors as illustrated in Schedule B.
- 4. Use privately-owned publicly accessible spaces to augment and enhance the neighbourhood network of parks, open spaces, trails and paths illustrated in Schedule B.
- 5. Provide community and neighbourhood park amenities including recreational and playground equipment, and where appropriate "tot lot" facilities as development proceeds.

Park and Open Space Design

- 6. Create inviting and recognizable parks which are useable and safe, with strongly defined access points and edges, and suitable grades.
- 7. Design pedestrian circulation within parks and open spaces to be barrier-free as much as possible and to integrate with neighbourhood streets and circulation systems.
- 8. Limit access to sensitive riparian areas and gullies along the Watkins Creek corridor to prevent soil erosion as well as disturbance of wildlife and aquatic habitat.
- 9. Where possible, protect significant trees and vegetation through the design of parks and other public open space.
- 10. Provide the local community with cultural opportunities for public art, gatherings and community events in the parks and open space system.

3.4 PARKS AND OPEN SPACE cont'd/

Trails

- 11. Ensure that proposed off-road trails in parks and open spaces conform to the trail classification system, design standards and guidelines presented in the Coquitlam Master Trail Plan (MTP).
- 12. Provide trailheads as outlined in Schedule B.
- 13. Locate trailheads in areas with high use, good visibility and nearby parking.

3.5 SCHOOL/PARK SITE

Description and Rationale

The combined Secondary and Middle School and Park site is located at the northeast corner of the neighbourhood. Developing joint school/park sites provides economy of scale and proximity benefits to School District No. 43 and City residents. Construction of outdoor recreational facilities and parking can be shared; additional open space lands increase outdoor educational values and the larger site creates a stronger neighbourhood focus and presence. The future secondary and middle schools will serve the anticipated needs of secondary and middle school students in the Northeast Coquitlam planning area. The joint school and park site is intended to be developed for use as educational facilities while providing active recreational, passive open space and interpretive learning opportunities within the neighbourhood.

3.5 SCHOOL/PARK SITE cont'd/

Policies

Joint School/Park

- 1. Develop a joint secondary school, middle school and park site at the location designated in Schedule A to establish a focal point for the Lower Hyde Creek Village neighbourhood and Northeast Coquitlam.
- 2. Use the combined larger school/park site to provide a broad range of active park and open space amenities integrated with educational facilities.
- 3. Create a strong visual and built form focus along the arterial and collector roads bordering the joint school and park.
- 4. Establish a prominent design element at the western terminus of the collector road that leads to the Northeast Coquitlam village centre.
- 5. Promote co-ordinated site development that minimizes on-site earthworks and maximizes pervious areas, including the protection and enhancement of natural features.
- 6. Provide urban greenway linkages and trails that connect the school/park site with the other neighbourhood parks, open spaces and residences.
- 7. Consider the incorporation of public art elements throughout the school and park development to contribute to the creation and enjoyment of a vibrant, attractive neighbourhood.
- 8. Locate and design water quality ponds in a manner sensitive to environmental values.

Traffic Circulation and Pedestrian Connections

- 9. Provide school and park site access from bordering arterial and collector streets, and establish a central drop-off zone to service both the school and the park areas.
- 10. Establish a pedestrian-only zone within the school and park site and ensure that this zone is designed according to barrier-free access standards.
- 11. Facilitate the shared use of parking spaces for the school and park to accommodate required parking. Shared parking reduces the need for large parking areas that are vacant for parts of the day or in the evening, and that visually detract from the neighbourhood experience.

3.5 SCHOOL/PARK SITE cont'd/

Traffic Circulation and Pedestrian Connections cont'd/

12. Encourage the development of pedestrian-friendly school and park areas through the use of designated routes and crossings and other traffic safety measures. Encourage the community to promote pedestrian safety through awareness programs.

Recreation Facilities

- 13. Ensure that play fields and recreational areas are visible from the surrounding streets and residential developments to provide informal surveillance and increased safety. Avoid blind corners and landscaping that obstructs sightlines.
- 14. Provide recreation facilities that are consistent with guidelines in the Parks, Open Space and Facilities Master Plan such as lit all-weather fields, ball diamonds, multiuse courts, social spaces, play areas, and hard surface and natural play opportunities.
- 15. Provide parks and trail facilities as outlined in Schedule B. Consider incorporating facility elements such as a nature trail lookout, environmental learning centre, community gardens and a composting demonstration area as part of the park development.

4. SERVICING COMPONENTS

4.1 TRANSPORTATION

The LHCVNP establishes a framework for the creation of a compact and walkable village neighbourhood using a coherent pattern of public streets, lanes and pedestrian and cycling routes. The primary transportation aim of the LHCVNP is to encourage walking, cycling and the use of public transit as an alternative to the private automobile. To achieve this objective, the neighbourhood street network is based on an interconnected grid to provide direct connections and multiple access points to key neighbourhood destinations. The street network increases mobility, accessibility, safety and pedestrian comfort while minimizing the social, environmental and financial costs of transportation infrastructure.

4.1.1 Street Network

- 1. Use a modified grid system of streets with short blocks to provide multiple travel routes for vehicles, pedestrians and cyclists as generally illustrated on Figure 1 Road Concept Plan. While rear lanes are encouraged in residential neighbourhoods, front-loaded street access may be provided where site development constraints such as steep topography, natural features, environmentally sensitive areas, and/or parcel size or configuration would limit vehicular access. To enhance the pedestrian-oriented character of medium and high density residential areas, rear lane access is preferred¹.
- 2. Establish Soball Street as a municipal collector street from Victoria Drive to David Avenue utilizing a new street alignment between Mason Avenue and David Avenue in accordance with Schedule A Land Use Designation.
- 3. Establish Mason Street as a collector street from Soball Street to Coast Meridian Road in accordance with Schedule A Land Use Designation.
- 4. Incorporate road design measures to reduce vehicle speeds, improve intersection safety, shorten crosswalk distances, and reduce vehicle-pedestrian conflicts, particularly along the streets near Leigh Elementary school and neighbourhood park sites.
- 5. Where front driveways are permitted, encourage shared access between adjacent residences to minimize the visual impact of driveways and reduce the number of driveways impacting the pedestrian environment.
- 6. Realign Coast Meridian Road such that its ultimate widened right-of-way width does not impinge any further into the riparian zone of Watkins Creek.

4.1 TRANSPORTATION cont'd/

4.1.1 Street Network cont'd/

- 7. The following NECAP policies have particular relevance for the development of the neighbourhood street network:
 - Road Rights-of-Way (Policy B-1.4);
 - Traffic Impact Studies (Policy B-1.13);
 - Subdivision and Road Allowances (Policy B-1.14);
 - Parking Management Strategies (Policy B-1.16)
 - Goods Movement (Policy B-2.0 a)); and
 - Transportation and Circulation Guidelines (Policy D-2.0).

4.1.2 Cycling Network

- 1. Create a coordinated system of bicycle routes that, together with the parks and open space network, allow movement throughout the neighbourhood and provide easy access to community destinations.
- 2. Provide for bicycle movement on arterial roadways along the boundaries of the neighbourhood in accordance with the City's Subdivision and Development Servicing Bylaw and Proposed Primary Area Bicycle Network (Map No.6) in the NECAP.
- 3. Include parking facilities for bicycles in all parks and at the joint secondary and middle school and park site. These should be placed in visible locations to allow casual surveillance.
- 4. The following NECAP policies have particular relevance for the development of the neighbourhood cycling network:
 - End of Trip Facilities (Policy B-5.2); and
 - Bicycle/Transit Integration (Policy B-5.3).

4.1.3 Pedestrian Network

- Link new pedestrian and cycling circulation systems with existing routes and integrate park trails with the public on-street walkway system to create a seamless pedestrian network generally as illustrated on Schedule B – Park and Open Space Concept Plan.
- 2. Establish a positive pedestrian realm along David Avenue, Victoria Drive, Coast Meridian Road and Soball Street through the provision of landscaping, street trees, and small open spaces suitable for casual socializing as part of proposed local street improvements.
- 3. Incorporate sidewalks, landscaped boulevards and street trees in accordance with the City's Subdivision and Development Servicing Bylaw.

4.1 TRANSPORTATION cont'd/

4.1.3 Pedestrian Network cont'd/

- 4. Enhance pedestrian crossings at key neighbourhood intersections to improve safety using flashing overhead lights, ground lit crosswalks, walk signals with countdown features, alternative paving materials, or a grade change to slow vehicular traffic and to promote awareness of pedestrian traffic particularly close to Leigh Elementary School and the joint secondary and middle school and park site.
- 5. Provide pedestrian links across David Avenue, Victoria Drive and Soball Street to connect the LHCVNP area with surrounding neighbourhoods.
- 6. Establish mid-block pedestrian connections to provide access between laneways, streets and parking areas.
- 7. The following NECAP policies have particular relevance for the development of the neighbourhood pedestrian network:
 - Intersection Design (Policy B-6.7);
 - Safety and Security School and Playground Areas (Policy B-6.9); and,
 - Accessibility (Policy B-6.10).

4.1.4 Transit Network

- 1. Accommodate transit facilities, such as shelters, benches and garbage receptacles, along David Avenue, Victoria Drive, Coast Meridian Road, Soball Street and other neighbourhood streets designated as bus routes.
- 2. Transit facilities should provide well-lit, visible and comfortable waiting areas appropriate for year-round weather conditions.
- 3. Ensure the collector streets and other streets designated as bus routes accommodate the needs of transit vehicles, facilitate their movements and provide convenient locations for stops near Leigh Elementary School and the joint secondary and middle school and park site.
- 4. The following NECAP policies have particular relevance for the development of the neighbourhood transit network:
 - Transit Priority Emphasis (Policy B-1.3);
 - Development of a Transit Supportive Network (Policy B-3.3); and,
 - Transportation and Circulation Guidelines [Policy D-2.0 (p)].

4.2 UTILITIES

Expansion of the City's infrastructure will be needed to accommodate development in the Lower Hyde Creek Village Neighbourhood. Future servicing must satisfy the functional demand created by future population growth and it must consider potential environmental impacts and storm water management requirements outlined in the HCIWMP. Concepts plans for neighbourhood water supply and distribution, sanitary sewer, and storm water servicing requirements to implement the LHCVNP are presented in Figures 2 to 4 (attached).

The LHCVNP aims to:

- Extend the full provision of municipal services in a phased, logical, efficient and coordinated manner so as to provide safe, reliable and sustainable water, sewer, and storm water services to the Lower Hyde Creek Village Neighbourhood; and,
- Ensure that environmental values and considerations are accounted for during the planning, design and construction of services in Lower Hyde Creek Village Neighbourhood.

4.2.1 Water Distribution

Figure 2 illustrates the proposed water distribution system for the Lower Hyde Creek Village Neighbourhood. The Lower Hyde Creek Village neighbourhood falls within proposed water pressure Zones 1 and 2. The northern boundary of water pressure Zone 2 is situated in the David Avenue right-of-way where it meets the water pressure Zone 3 boundary. The southern boundary of water pressure Zone 2 is situated near the 65m contour (roughly in line with Mason Avenue). The water distribution system will consist of a network of 150mm and 200mm pipes located in the neighbourhood road right-of-ways. Water pressure for Zone 1 will be provided from Coquitlam Lake and will be supplemented at times by water pumped from the Oxford Heights Pump Station. Water pressure for Zone 2 will be provided by the Harper reservoir, which is located on Harper Road near the Coast Meridian Road/Harper Road intersection, and will be supplemented at different times by water provided from Coquitlam Lake.

It will be necessary to upgrade the supply system before development can occur. Upgrading is expected to include installation of a 600mm supply main along David Avenue. In addition a 400mm supply main (Zone 2) will be installed along Mason Avenue connected to an existing 300mm supply main from Pipeline Road.

4.2 UTILITIES cont'd/

4.2.1 Water Distribution cont'd/

Policies

- 1. Upgrade and expand the water supply system to support development.
- 2. Install the network of water mains within the neighbourhood in conjunction with the network of roads and other services
- 3. Establish water servicing facilities as generally illustrated on Figure 2 Water Servicing Concept Plan.
- 4. Implement and monitor water conservation programs such as lawn watering restrictions, metering and use of water storage systems such as rain barrels or cisterns, as and when directed by Council.

4.2.2 Sanitary Sewer

All lots within the LHCVNP area will be serviced by a gravity sanitary sewer system that is connected to the existing City sewer system (Figure 3). Servicing is divided into two catchment areas. A western catchment area servicing the properties west of Coast Meridian Road and the properties west of Leigh Elementary School; while an eastern catchment extends from the joint secondary and middle school and park site south past Leigh Elementary School to Victoria Drive. The sanitary sewer system will be installed both in front roadways and within rear lanes in conjunction with road works and neighbourhood redevelopment."

- Establish sanitary sewer facilities as generally illustrated on Figure 3 Sanitary Servicing Concept Plan.
- 2. Install sanitary sewer services in conjunction with the proposed road network and other services.
- 3. In response to neighbourhood topography, install sewers at the southern (downstream) end of each catchment area before proceeding northward.

4.2 UTILITIES cont'd/

4.2.3 Stormwater Management

As required by the Citywide OCP the neighbourhood plan includes a storm water management concept which reflects watershed conditions and needs identified in the Hyde Creek Integrated Watershed Management Plan (HCIWMP). This concept aims to protect property from floods, provide sediment control and protect water quality, ensure summer base flows and prevent erosion of stream corridors.

The principal components of the storm water management system are shown on Figure 4A - Stormwater Servicing Concept Plan and Figure 4B - Stormwater Servicing Concept Plan (attached). These include a conventional system of gravity storm sewers, a number of water quality ponds, and a bypass storm sewer that diverts post-development major flows away from local creeks. Pre-development major flows would continue to travel overland to watercourses. Another principal component is the inclusion of Low Impact Development (LID) techniques designed to minimize the proportion of impervious surfaces and to maximize the proportion of urban drainage that is infiltrated back into the ground.

The Hyde Creek Integrated Watershed Management Plan (HCIWMP) prescribes the general arrangement of the major stormwater components without providing details of the drainage system. As the HCIWMP represents a relatively new approach to stormwater management, it may require refinement during the implementation process. At the same time, adjustments to the storm water management plan at the neighbourhood level must not compromise the storm water management system identified for the entire Hyde Creek Watershed as outlined in the HCIWMP.

In order for the drainage system to function in the intended manner, it will be necessary for the diversion sewer to first be completed all the way to Debouville Slough. This will involve construction of a significant length of large-diameter storm water diversion sewer beyond the boundary of the neighbourhood plan.

Some development may proceed prior to the completion of the storm water diversion sewer provided interim detention and water quality facilities are provided within the neighbourhood in compliance with the requirements of the HCIWMP and the City's Subdivision and Development Servicing Bylaw and Storm Water Management Policy and Design Manual.

4.2 UTILITIES cont'd/

4.2.3 Stormwater Management cont'd/

- Establish neighbourhood storm water management facilities as generally illustrated on Figure 4a Stormwater Servicing Concept Plan or Figure 4b – Stormwater Servicing Concept Plan.
- 2. Ensure that storm water management facilities are established in conformance with the HCIWMP.
- 3. Secure required lands for storm water quality ponds and install storm water sewers in a controlled, logical development progression.
- 4. Incorporate Low Impact Development (LID) techniques designed to reduce impervious surfaces and increase ground-water infiltration throughout the neighbourhood; and create a Policy and Procedures Manual for LID Techniques as recommended in the HCIWMP.
- 5. Use environmentally sensitive maintenance procedures and practices.
- 6. Remove barriers to fish movement and encourage streamside enhancement programs involving local streamkeepers groups and community organizations, as per Council's Hyde Creek Watershed Habitat Enhancement Opportunities Policy.
- 7. Design stormwater quality ponds to provide sediment settling and minor water quality treatment for smaller storm events.
- 8. Ensure that the size and configuration of storm water quality ponds conform to the HCIWMP and the Stormwater Management Policy and Design Manual, which include design guidance for ponds to be visually appealing and functional as wetland habitat, using native plant species.
- 9. Provide vehicular access for regular maintenance and cleaning of storm water management facilities.

5. DEVELOPMENT PERMIT AREAS¹

The City welcomes and encourages innovative design solutions to achieve high quality urban environments that are walkable and liveable. All Development Permit Area Guidelines that apply to the Lower Hyde Creek Neighbourhood Plan area are located in Part 4 of the CWOCP.