

PO Box 1749 Halifax, Nova Scotia B3J3A5 Canada

Harbour East Community Council June 8, 2006

TO:	Harbour East Community Council
SUBMITTED BY:	Jall Harnish //or Ray DeRoche, Chair Harbour East Planning Advisory Committee
RE:	Case 00846 - Portland Hills Phases 4 & 5 Development Agreement
DATE:	June 6, 2006

<u>ORIGIN</u>

Harbour East Planning Advisory Committee meeting - June 5, 2006

RECOMMENDATION

The Harbour East Planning Advisory Committee recommend that Harbour East Community Council:

- 1. Give Notice of Motion to consider the proposed development agreement and to schedule a public hearing;
- 2. Approve the proposed development agreement, presented as Attachment A of the staff report dated June 1, 2006, to allow for a comprehensively planned community on 103 acres in Portland Hills owned by Clayton Developments Limited, with an amendment that Community Council consider a requirement for undergrounding all secondary services, and;
- 3. Require that the development agreement be signed within 120 days or any extension thereof granted by the Community Council on request of the applicant from the date of final approval by the Community Council and any other bodies as necessary whichever approval is later, including applicable appeal periods, otherwise, this approval will be void and obligations arising hereunder shall be at an end.

ATTACHMENTS

Staff report dated June 1, 2006

Additional copies of this report, and information on its status, can be obtained by contacting the Office of the Municipal Clerk at 490-4210, or Fax 490-4208.

Report prepared by: Gail Harnish, Admin/PAC Coordinator, 490-4937 Report reviewed by: Ray DeRoche, Chair, Harbour East PAC

HALIFA REGIONAL MUNICIPA	PO Box 1749 Halifax, Nova Scotia B3J 3A5 Canada
	Harbour East Planning Advisory Committee June 5, 2006
ГО:	Harbour East Planning Advisory Committee
SUBMITTED BY:	Paul Dumphy, Director of Planning & Development Services
DATE:	June 1, 2006
SUBJECT:	Case 00846 - Portland Hills Ph 4 & 5 Development Agreement

<u>ORIGIN</u>

Application by Clayton Developments Ltd.

RECOMMENDATION

It is recommended that Harbour East Community Council:

- 1. Give Notice of Motion to consider the attached development agreement and to schedule a public hearing;
- 2. Approve the proposed development agreement, presented as Attachment A to this report, to allow for a comprehensively planned community on 103 acres in Portland Hills owned by Clayton Developments Ltd., and;
- 3. Require that the development agreement be signed within 120 days or any extension thereof granted by the Community Council on request of the applicant from the date of final approval by the Community Council and any other bodies as necessary whichever approval is later, including applicable appeal periods, otherwise, this approval will be void and obligations arising hereunder shall be at an end.

EXECUTIVE SUMMARY

The proposal is for a 103 acre, 462 unit, mixed residential community (Map 1) to form an extension to the existing Portland Hills Subdivision. A Public Participation Committee worked with staff and the developer to prepare a concept plan for the area, as required under the CDD (Comprehensive Development District) zoning. The Dartmouth Lakes Advisory Board was represented by having a member on the PPC and this proposal was presented to the entire Board on May 31, 2006.

After full consideration of the issues, and applicable policy, staff recommend approval of the proposed development agreement.

BACKGROUND

Site Description and Project History

The subject property is situated in Dartmouth and is bounded by Morris Lake on the west, Bell Brook and the first phases of the Portland Hills Subdivision on the north, the Innishowen subdivision on the east and undeveloped lands to the south (refer to Map 1). Portions of the property are well vegetated with a mix of hardwood and softwood trees. Bell Brook (a watercourse linking Bell Lake to Morris Lake) traverses the site, as does another small watercourse to the south. Much of the property is typified by steep slopes and silt soils.

In 2000, Community Council approved a development agreement for 93 acres as the first phase of the Portland Hills Subdivision (Case 00251). In 2004, this agreement was amended to include an additional 38 acres to the subdivision (Case 00554).

The Proposal

Of the developer's original 270 acre land holding, approximately 103 acres remain undeveloped and are the subject of this application. The proposal is to build a mixed residential community with 180 single unit dwellings; 52 'lifestyle' dwellings (attached bungalow style homes), 70 townhouse units; and 3 multiple unit buildings with 160 units. Concept drawings and summary tables describing the proposed land uses, municipal services, parkland, and environmental buffer areas are presented as schedules to the development agreement (Attachment A).

Zoning and Enabling Policy

This application is made pursuant to policies of the Morris-Russell Lake Secondary Planning Strategy adopted under the Municipal Planning Strategy for Dartmouth by Regional Council on March 22nd, 2005. To implement this policy direction, a majority of lands in the Morris-Russell Lake area were zoned 'Comprehensive Development District' (CDD). Any development within a CDD requires approval of a development agreement by Community Council. The Council must be satisfied that the proposal conforms with the planning policies before granting approval.

DISCUSSION

The policies to be considered by Council when assessing such applications are presented in Attachment B accompanied by a detailed staff evaluation. Staff is satisfied the proposal conforms with policy criteria and approval is recommend. A brief summary of this review follows:

Transportation:

- A traffic study undertaken in support of this application has been reviewed by the HRM Traffic Authority and has been deemed to meet policy ML-8. The study demonstrates the level of service on Portland St and Caldwell Rd will conform with HRM performance criteria for all but the last phase of development. The agreement restricts subdivision of the last phase until this policy can be satisfied (approximately 46 dwellings on Cherrybrook Extension.).
- All proposed streets will be classified as local roads with a sidewalk on at least one side. While MPS policy prohibits road connections from Caldwell Rd to Portland St, pedestrian links will be established to connect adjacent communities and ensure Innishowen residents retain direct access to Morris Lake through a series of walkways and nature trails.

Municipal Sewer and Water Services

- Schematics of the municipal services are illustrated on Schedule E. The agreement allows HRM to obtain a service easement to provide service access to vacant lands to the south.
- The Halifax Regional Water Commission (HRWC) has confirmed that water system improvements along Caldwell Road were completed in February 2005. These improvements have addressed low pressure concerns in the Innishowen Subdivision and as a result, development restrictions on the Caldwell Rd System are no longer applicable. The existing system can satisfactorily accommodate the additional development.
- The HRWC has completed a water system Master Plan for the area and has interim NSUARB approval for a CCC for the Morris Russell Lake area. The HRWC has confirmed that the proposed water system for PH 4 & 5 will be consistent with the Master Plan,
- The proposed servicing scheme allows HRM to consider eliminating a pumping station on Eagle Lane. This has the potential to reduce HRM operations costs and risks associated with potential overflows.

Environmental Protection:

A 30.5 metre(100') buffer zone from the shoreline of Morris Lake is to be established, all of which will be publicly owned. 20 metre (66') buffers are also required on each side of both watercourses in anticipation of the requirement under the draft Regional Plan. The first 15.2m (50') will be conveyed to the HRM, while the remainder will be privately held. The amount of public shoreline ownership proposed (100%) exceeds secondary plan policy requiring only 50% public ownership.

- A water quality monitoring program will be undertaken by the HRM in accordance with the policy criteria established under the secondary planning strategy. The developer has agreed to cash contributions in each phase of the development in support this program.
- A conceptual erosion control plan and stormwater management plan are attached to the development agreement which also requires that final plans meet all the requirements of the NS Department of Environment, and comply with the *Morris Lake Stormwater Management Plan* adopted under the secondary planning strategy.

Land Use & Development:

- A mix of single unit homes, two storey townhouses, bungalow townhouses and apartment buildings are proposed. Concepts plans illustrating how this might be realized are provided in Schedules B and C of the agreement.
- Higher density uses are proposed farther from existing low density housing. Overall density of development is about 4.5 units per acre, well under the CDD threshold of 8 units per acre.

Parks and Open Spaces:

- In addition to a land dedication for three neighbourhood parks, site work will be undertaken to prepare the land for park development and a \$14,000 cash contribution made for each park.
- Additional open space will be conveyed to the HRM through the dedication of watercourse and shoreline buffers and other residual lands. A total of 26.5 acres of parkland and open space is proposed. This represents a park dedication of 25.7% of total site area. Proposed parkland and open space is illustrated and summarized on Schedule G.
- Rudimentary trails will be provided throughout the development to increase pedestrian
 mobility and support physical activities such as hiking and enjoyment of nature. HRM has
 reserved the right in the agreement to upgrade the width and surfacing of some nature trails
 should they be desirable for use as Active Transportation corridors at some point in the future.
 HRM will be responsible for ensuring the primary purpose (environmental protection) of the
 buffer areas is maintained.

Public Consultation

CDD zoning also requires the establishment of a Public Participation Committee (PPC) with a mandate to guide the preparation of detailed concept plans for the development. A PPC was appointed by Community Council last December, and met several times to review and refine the development plans, and discuss community issues with the developer and HRM staff. This committee's final report recommends in favour of the proposed development and will be forwarded to Council in conjunction with this staff report.

The PPC also facilitated a public information meeting held March 6th, 2006. Minutes of this meeting are attached to the PPC report. Members of the public in attendance seemed generally

Portland Hills PH 4 & 5 DA		Harbour East PAC
Case 00846	- 5 -	June 5, 2006

comfortable with the proposal but there were some issues related to buffering existing residences from those proposed. The developer has tried to address these concerns through the provision of a 20 foot treed buffer as shown in the attached schedules to the development agreement.

Should Community Council decide to hold a public hearing on this application, individual property owners within the notification area shown on Map 1 will be notified by mail. In addition, two advertisements will be placed in the local newspaper.

The Dartmouth Lakes Advisory Board was represented by having a member on the PPC and this proposal was presented to the entire Board on May 31, 2006.

BUDGET IMPLICATIONS

In accordance with the Municipality's capital cost contribution (CCC) policies, a CCC study is currently being undertaken. Once completed, a division of costs will be proposed to Regional Council and implementation will be through the introduction of infrastructure charges under the Subdivision By-law. In the event that the proposal is not acceptable to Regional Council, the Municipality is protected as the agreement will not allow any subdivision approvals until infrastructure charges are in effect, or an infrastructure charge agreement approved by Regional Council has been entered into between the parties (see clause 3.2 of the agreement)

FINANCIAL MANAGEMENT POLICIES / BUSINESS PLAN

This report complies with the Municipality's Multi-Year Financial Strategy, the approved Operating, Capital and Reserve budgets, policies and procedures regarding withdrawals from the utilization of Capital and Operating reserves, as well as any relevant legislation.

ALTERNATIVES

- 1. The application could be approved, as recommended by staff.
- 2. Community Council may choose to make revisions to the proposed agreement, subject to consent by the applicant. This may require additional staff report(s), depending on the nature of any requested revision.
- 3. The application could be rejected. If this option is chosen, the Municipal Government Act requires that the Community Council state the reasons for the decision.

ATTACHMENTS

Subject Area and Notification Area		
Proposed Development Agreement with:		
Schedule A	Plan of Development Area and Legal Description	
Schedule B	Concept Plan	
Schedule C	Land Use Plan	
Schedule D	Roads, Sidewalks, Sidewalks & Trails	
Schedule E	Municipal Services	
	Proposed De Schedule A Schedule B Schedule C Schedule D	

Portland Hills PH Case 00846	4 & 5 DA	- 6 -	Harbour East PAC June 5, 2006
	Schedule F Schedule G	Phasing and Development Cl Parks	hart
	Schedule H	Life Style Condos - Bellbrook	k Crescent
	Schedule I	Stormwater Management Pla Sedimentation Minimization	
Attachment B		of Policy Criteria under the Mo rategy of the Dartmouth Munic	
Additional copies of this r	eport, and informatior	n on its status, can be obtained by contac 490-4181, or Fax 490-4208.	ting the Office of the Municipal Clerk at
	Report Prepar	ed by: Hanita Koblents, Planner, tel: 490)-4181



Attachment A: Proposed Development Agreement:

THIS AGREEMENT made this day of, 2006,

BETWEEN:

CLAYTON DEVELOPMENTS LIMITED

(hereinafter called the "Developer")

OF THE FIRST PART

-and-

HALIFAX REGIONAL MUNICIPALITY,

a body corporate, in the County of Halifax, Province of Nova Scotia (hereinafter called the "Municipality")

OF THE SECOND PART

WHEREAS the Developer is the registered owner of certain lands (PID# 41046202) south of Bell Brook bounded by Portland Hills, Innishowen, and Morris Lake, in Dartmouth, Nova Scotia, and which said lands are more particularly described in Schedule "A" to this Agreement (hereinafter called the "Lands");

AND WHEREAS the Developer has requested that the Municipality enter into a development agreement to allow for the construction of a mixed residential development on the Lands pursuant to the provisions of the <u>Municipal Government Act</u> and the Municipal Planning Strategy and Land Use By-law for Dartmouth;

AND WHEREAS the Community Council approved this request at a meeting held on ______ 2006 referenced as Municipal Case Number 00846;

THEREFORE in consideration of the benefits accrued to each party from the covenants herein contained, the Parties agree as follows:

PART 1: DEFINITIONS

In this Agreement, unless the context otherwise requires:

- (i) "Community Council" means the Harbour East Community Council of the Municipality.
- (ii) "Development Engineer" means any person designated by the Municipality to grant approvals for the design, construction and acceptance of municipal service systems.

- (iii) "Development Officer" means a person appointed by Regional Council to administer the Land Use and Subdivision By-laws and the terms and conditions of this Agreement.
- (iv) "Landscape Architect" means a professional who is a member in good standing of the Atlantic Provinces Association of Landscape Architects.
- (v) "Parkland Planner" means a person designated by the Municipality to make recommendations to the Development Officer regarding the acceptance of parkland and open space dedications to the Municipality.

PART 2: GENERAL REQUIREMENTS AND ADMINISTRATION

- 2.1 The Developer agrees that the Lands shall be subdivided, developed and used only in accordance with and subject to the terms and conditions of this Agreement.
- 2.2 Except as otherwise provided for herein, the development and use of the Lands shall comply with the requirements of the applicable Land Use By-law and Subdivision By-Law, as may be amended from time to time.
- 2.3 Pursuant to Section 2.2, nothing in this Agreement shall exempt or be taken to exempt the Developer, lot owner or any other person from complying with the requirements of any by-law of the Municipality applicable to the Lands (other than the Land Use By-law and Subdivision By-law to the extent varied by this Agreement), or any statute or regulation of the Province of Nova Scotia, and the Developer or lot owner agrees to observe and comply with all such laws, by-laws and regulations in connection with the development and use of the Lands.
- 2.4 Where the provisions of this Agreement conflict with those of any by-law of the Municipality applicable to the Lands (other than the Land Use By-law and Subdivision By-law to the extent varied by this Agreement) or any provincial or federal statute or regulation, the higher or more stringent requirements shall prevail.
- 2.5 The Developer and each lot owner shall be responsible for all costs, expenses, liabilities and obligations imposed under or incurred in order to satisfy the terms of this Agreement and all federal, provincial and municipal regulations, by-laws or codes applicable to any lands owned by the Developer or lot owner.
- 2.6 The provisions of this Agreement are severable from one another and the invalidity or unenforceability of one provision shall not affect the validity or enforceability of any other provision.

PART 3: LAND USE AND DEVELOPMENT PROVISIONS

3.1 Schedules

The Developer shall subdivide, develop and use the Lands generally in conformance with the following Schedules to this Agreement:

Schedule A	Development Area
Schedule A1	Legal Description Lands
Schedule B	Concept Plan
Schedule C	Land Use
Schedule D	Roads, Sidewalks, & Trails
Schedule E	Municipal Services
Schedule F	Phasing and Development
Schedule G	Parks
Schedule H	Life Style Condos - Bellbrook Crescent
Schedule I	Stormwater Management Plan and Erosion & Sedimentation
	Minimization Plan

3.2 Subdivision

The Development Officer shall grant subdivision approvals for the phase for which approval is sought subject to and in accordance with the following terms and conditions:

- 3.2.1 Approvals shall be issued for no more than one phase of this development prior to the completion of the Highway 111 Interchange and Baker Drive.
- 3.2.2 Capital Cost Contribution:
- (a) In accordance with Policy ML-2 of the Dartmouth Municipal Planning Strategy, as amended from time to time, no subdivision approvals shall be granted unless infrastructure charges to be applied to the Lands have been approved by Regional Council and are adopted under the Subdivision By-law and the required charges have been paid by the Developer to the Municipality;
- (b) The Developer acknowledges that Lands on Cherrywood Extension may be subject to a separate Capital Cost Contribution calculation.
- 3.2.3 Cherrywood Extension
- (a) No subdivision approvals shall be granted for any lot on Cherrywood Extension until such time as requirements under ML-8 of the Dartmouth Municipal Planning Strategy have been met with respect to traffic level of service on Caldwell Road, to the satisfaction of the Development Engineer.

3.2.4 Subdivision Grading Plans:

- (a) Prior to the commencement of any site works on the Lands, the Developer shall obtain a recommendation of approval by the Development Engineer for a detailed Subdivision Grading Plan for the phase of development for which subdivision approval is sought. The Subdivision Grading Plan shall delineate non-disturbance boundaries for all lots in substantial conformance with Schedule B, and the Developer shall be responsible for ensuring that individual house plans and building pads minimize the amount of site disturbance on each lot;
- (b) The Developer shall prepare detailed individual lot grading plans, which shall comply with the Subdivision Grading Plan. Modifications to the site grading and proposed finished elevations, as indicated on the Plan, may be approved by the Development Engineer, provided such modifications further the intent of this Agreement. The Developer shall provide written conformation of compliance that the lot grading has been completed according to the plans, and where it is determined that any lot grading has not been properly carried out, remedial or corrective measures shall be immediately carried out by the Developer at its cost. It shall further be the responsibility of the Developer or Lot Owner to ensure that contractors and home purchasers are aware of the lot grading plans and site non-disturbance areas;

3.2.5 Water Quality Monitoring

Prior to final approval of subdivision, the Developer agrees to make a cash contribution towards a water monitoring program to be carried out in Morris Lake. The amount of the contribution will be \$3,000 for the first phase, followed by \$1,000 for each of four subsequent phases for a total of \$7,000.

3.3 Streets and Municipal Services

- 3.3.1 The Developer shall be responsible for securing all applicable approvals with the on-site and off site servicing systems required to accommodate the development, including streets, street intersection improvements, sidewalks, sanitary sewer system, water supply system, storm sewer and drainage system and utilities, as generally illustrated by the Schedules attached hereto. Such approvals shall be obtained in accordance with all applicable by-laws, standards, polices and regulations of HRM and other approval agencies, except as provided for herein. All costs associated with the supply and installation of all servicing systems and utilities related to these lands will be the responsibility of the Developer unless otherwise authorized by the Municipality. Oversizing costs are to be calculated through the Capital Cost Contribution required under 3.2.1.
- 3.3.2 The alignment and configuration of street rights-of-way, sidewalks and walkways shall substantially conform with the alignment and configurations presented on Schedule D;.

Portland Hills PH 4 & 5 DA		Harbour East PAC
Case 00846	- 11 -	June 5, 2006

- 3.3.3 The Development Officer may consider a revised plan to allow Driveway # 1 on Schedule B to be developed as a public road, provided HRM regulations are met.
- 3.3.4 Unless otherwise permitted by the Development Engineer, temporary turning bulbs shall be provided at the end of each Phase;
- 3.3.5 Road reserves and associated services shall be extended to adjacent property lines as required in the Municipal Service Systems Manual and cost shared according to the Capital Cost Contribution calculation;
- 3.3.6 Any disturbance to existing off-site infrastructure resulting from the development, including but not limited to, streets, sidewalks, curbs and gutters, landscaped areas and utilities, shall be the responsibility of the Developer, and shall be reinstated, removed, replaced or relocated by the Developer as directed by the Development Engineer.
- 3.3.7 Prior to subdivision approval of any component of Phase 4, the Developer shall provide the Municipality with a plan showing the proposed service extension along "Driveway 1" contained in Phase 4. The Developer further agrees to complete the extension of municipal services to the boundary line of the adjacent property within 18 months of receiving subdivision approval for any component of Phase 4. Tentative Subdivision Approval for Phase 5 will be withheld until the services are installed in "Driveway 1".
- 3.3.8 Where storm and sanitary infrastructure is proposed outside of a street right of way, adequate width for easements, as determined by the Development Engineer, shall be provided for maintenance purposes and the infrastructure shall be readily accessible;
- 3.3.9 Digital files of all record drawings of municipal services are to be provided to the Municipality in metric units and in a form acceptable to the Development Engineer.

3.4 Parks and Open Space

- 3.4.1 The Developer agrees to convey Park and Open Space Lands to the Municipality concurrently with the phase for which subdivision approval is sought generally in accordance with Schedules F & G.
- 3.4.2 The Developer agrees to design and construct all parks, trails, footbridges, docks, etc. in accordance with the requirements of this section (3.4) and Schedule G of the agreement. The design and construction of all parks, trails, footbridges, docks, etc. shall be approved by the Parkland Planner prior to final endorsement of subdivision of the applicable phase. The Parkland Planner will use the HRM Parkland Planning Guidelines in evaluating any design.
- 3.4.3 The Developer agrees that any existing mature vegetation, and in particular, any healthy trees shall be identified and protected through the design and construction of all parks.

- 3.4.4 Unless otherwise directed by a Parkland Planner, five (5) footbridges shall be supplied to provide watercourse crossings for the nature paths proposed. The design shall meet all applicable codes and regulations and shall be approved by a Parkland Planner prior to installation.
- 3.4.5 Blazed nature paths shall include the removal of any trees that have fallen across the path, the removal of any limbs below 1.8 metres (6 feet) in height along the path, preparation of a footpath so as to provide for a stable footing (but without any disturbance to the ground surface), and the blazing of the trail.
- 3.4.6 HRM reserves the right to upgrade the width and surface treatment of any nature paths and trails at some point in the future to accord with the HRM Active Transportation Plan, provided the primary role of the buffer as an environmental protection zone is not substantially diminished.
- 3.4.7 Three (3) Neighbourhood Parks will be conveyed to the Municipality, in areas as generally illustrated on Schedule G. Each park shall meet the following minimum requirements, unless otherwise approved by the Parkland Planner:
 - (i) Minimum area of six thousand 557.4 square metres (6,000 square feet);
 - (ii) Minimum frontage of 18.3 metres (60 feet)
 - (iii) Minimum contiguous width of 18.3 metres (60 feet); and
 - (iv) Have the surface stabilized so as to prevent erosion and otherwise be suitable for Neighbourhood Park uses including but not limited to playground equipment of an area measuring a minimum of 334.4 square metres (3600 square feet) that will be cleared, graded and sodded
 - (v) Have a grading plan that has been approved by the Parkland Planner prior to undertaking site preparation.
 - (vi) Include a fourteen thousand dollar (\$14,000) cash contribution to be used within the Portland Hills development and to be conveyed to the Municipality at the same time as each park
 - (vii) To the greatest extent possible, engineering infrastructure shall not be located within Neighbourhood Parks unless full integrated with the park use and designed to complement the objectives of the park parcel.
- 3.4.8 In addition to the above, the following special requirements shall apply to some of the parks:
 - Park #2: The Developer agrees that Park #2 will have a minimum frontage of 36.6m (120 feet) on Street S, and that the required stream and lake buffers as per 6.3.1 of this agreement, shall be conveyed within this park. The Developer also agrees to construct a 1.8 metre (6 foot) wide crusher dust path from Street 'S' to the edge to the Neighbourhood Park, and continue this trail through the lake buffer zone as a 1.2 metre (4 foot) wide wood chip surfaced walking trail along

the extent of the lakeshore to the edge of the property as shown on Schedule D and in accordance with Section 6 of this agreement (Environmental Protection)

The Developer also agrees to supply and install two footbridges as per section 3.4.4 in locations as generally shown on Schedule G, and a seasonally removable floating dock (approximately 1.8 by 3.0 metres) (6 x 10 feet) anchored at the land - water edge.

- (ii) Park #3: The Developer agrees to convey a parcel of land that is a minimum of 12.2 x 30.5 metres (40 x 100 feet) for the purposes of park dedication, and notwithstanding Section 3.4.5 (iv), the Developer shall further consult with adjacent owners and HRM Parkland Planning prior to carrying out any improvements on this site.
- (iii) Park #4: In addition to the steeply sloped lands between the backs of properties located on Cherrywood Extension and Street 'S' as shown on Schedule D, the Developer agrees to convey to HRM lands a minimum of 15.2 metres (50 feet) from the edge of each side of Brook #2 to serve as a buffer zone. The Developer also agrees to construct a blazed nature path through this area as generally shown on Schedule G.

Two footbridges shall be supplied and installed as per section 3.4.4 in locations as generally shown on Schedule G.

- (iv) Park #5: Bell Brook Corridor. The Developer agrees to convey lands a minimum of 15.2 metres (50 feet) from the edge of each side of Bell Brook to serve as a buffer zone. The Developer also agrees to construct a blazed nature path through this area as generally shown on Schedule G.
- (v) Park #6: Bell Brook Corridor The Developer agrees to convey lands to serve as a buffer as per the conveyance for Park #5. One footbridge shall be supplied and installed as per section 3.4.4 in the location as generally shown on Schedule G.
- 3.4.9 Pursuant to this Section, no final endorsement of subdivision shall be issued for any phase under consideration until all parkland and open space improvements have been carried out and the parkland conveyed to the Municipality, except that final endorsement may be issued subject to security being provided to the Municipality in the amount of 120 percent of the estimated cost of completion of all outstanding work. The security shall be in favour of the Municipality and may be in the form of a certified cheque or irrevocable, automatically renewable letter of credit issued by a chartered bank. The security shall be returned to the Developer only upon completion of all work, as approved by the Parkland Planner.

PART 4: USE OF LANDS AND DEVELOPMENT PROVISIONS

4.1 **Permitted Uses**

4.1.1 The use of the Lands permitted by this Agreement, subject to its terms and as generally illustrated on the Schedules and Development Chart, attached hereto, are the following:

Single Unit Dwellings (R-1) Single Unit Dwellings - Smaller Lot (R-1S) Lifestyle Dwelling Units (LF) Townhouse (TH) Multiple Unit Dwellings (R-3) Park and Open Space Uses Accessory Uses to the Foregoing Utilities

4.1.2 All secondary utilities shall be located underground for all TH, LF, and R1-S buildings unless otherwise approved by the Development Officer. In addition, all secondary utilities shall be located underground to all R-1 buildings located on cul-de-sac bulbs.

4.2 Single Unit Dwellings (R-1)

No development permit shall be issued for a Single Unit Dwelling except in conformance with the following:

Minimum lot frontage	15.2 metres (50 ft) (at the building line)	
-	7.6 metres (25 ft) - on outside of curve, or part thereof	
Minimum lot area	464.5 square metres (5000 sq. ft.)	
Minimum front yard	4.6 metres (15 ft) - to the nearest portion of the structure	
-	5.5 metres (18 ft) (to the building wall)	
Minimum rear yard	4.6 metres (15 ft) - to the building wall	
-	1.2 metres (4 ft) (for accessory buildings)	
Minimum side yard	1.5 metres (5 ft) (with attached garage)	
	1.5 metres (5 ft) one side; 2.7 metres (9 feet) other side	
	(with no attached garage)	
	1.2 metres (4 ft) (for accessory buildings)	
Minimum flankage yard	4.6 metres (15 ft) - to the building wall	
Maximum lot coverage	35%	
Maximum building height	9.1 metres (30 ft) (from average finished grade to top of cornice, excepting gables)	
Minimum driveway length	5.5 metres (18 ft) (to the building wall)	

4.3 Small Lot Single Unit Dwellings (R-1S)

No development permit shall be issued for a Small Lot Single Unit Dwelling except in conformance with the following:

and mills rn 4 & 5 DA	Harbour I	Last PAC
00846	- 15 - Jun	e 5, 2006
Minimum lot frontage	12.2 metres (40 ft) (26.1 metres or 20 feet on outsid curve, or portion thereof)	e of
Minimum lot area	371.6 square metres (4000 sq. ft).	
Minimum front yard	4.6 metres (15 ft) -to the nearest portion of the struc 5.5 metres (18 ft) (to the building wall)	ture
Minimum rear yard	4.6 metres (15 ft) - to the building wall 1.2 metres (4 ft) (for accessory buildings)	
Minimum side yard	 1.5 metres (5 ft) (with attached garage) 1.5 metres (5 ft) on one side and 2.7 metres (9 ft) or 	other
	side (with no attached garage)	
	1.2 metres (4 ft) (for accessory buildings)	
Minimum flankage yard	4.6 metres (15 ft) - to building wall	
Maximum lot coverage	35%	
Maximum building height	9.1 metres (30 ft) (from average finished grade to to cornice, excepting gables)	p of
Minimum driveway length	5.5 metres (18 ft) (to the building wall)	

Harbour East PAC

4.4 Lifestyle Dwelling Units (LF)

No development permit shall be issued for a Lifestyle Dwelling Unit except in conformance with the following:

Minimum lot frontage	7.3 metres (24 ft) per unit4.6 metres (15 ft) per unit (on outside of curve, or portion thereof)
Minimum lot area	223 square metres (2400 sq. ft.) per unit
Minimum front yard	4.6 metres (15 ft) (to the nearest portion of the structure) 5.5 metres (18 ft) (to the building wall)
Minimum rear yard	4.6 metres (15 ft) (to the building wall) 2 ft. (for accessory buildings)
Minimum side yard	2.7 metres (9 ft) (ends of building)
	0.6 metres (2 ft) (for accessory buildings)
Minimum flankage yard	4.6 metres (15 ft) (to the building wall)
Maximum lot coverage Maximum number of units	50%
per building block	6
Maximum building height	6.1 metres (20 ft) (from average finished grade to top of cornice, excepting gables)
Minimum driveway length	5.5 metres (18 ft) (to the building wall)

4.5 Townhouse (TH)

No development permit shall be issued for a townhouse dwelling unit except in conformance with the following:

Minimum lot frontage	26.1 metres (20 ft) per unit
Willing for Holding	4.6 metres (15 ft) (on outside of curve, or portion thereof)
Minimum lot area	185.8 square metres (2000 sq. ft) per unit
Minimum front yard	4.6 metres (15 ft) (to nearest portion of the structure)
	18 ft. (to the building wall)
Minimum rear yard	4.6 metres (15 ft) (to the building wall)
	0.6 metres (2 ft) (for accessory buildings)
Minimum side yard	2.7 metres (9 ft)(ends of building)
	0.6 metres (2 ft) (for accessory buildings)
Minimum flankage yard	4.6 metres (15 ft) (to the building wall)
Maximum lot coverage	40%
Maximum number of units	
per building block	6
Maximum building height	9.1 metres (30 ft) (from average finished grade to top of
	cornice, excepting gables)
Minimum driveway length	5.5 metres (18 ft) (to the building wall)
Maximum driveway width	2.7 metres (9 ft) at curb cut, 10 ft. for remainder.

- 16 -

Harbour East PAC

June 5, 2006

4.6 Special Provisions for LF and TH Dwelling Units

- 4.6.1 Provision shall be made for the storage of recycling containers and organic composters (i.e green carts) such that they shall not visible from the street frontage by: (a) construction of a screened storage area (e.g wood lattice or acceptable equivalent) integral with the building facade; or (b) provision of a common waste management area appropriately screened for the shared use of all dwellings; or (c) any other means.
- 4.6.2 Central air conditioning units, fuel tanks and exhaust vents shall be located in the side or rear of the dwelling, and shall not face any public street.
- 4.6.3 Blank endwalls where they face public streets shall be avoided by inclusion of at least one window or door on each floor facing the public street.
- 4.6.4 Where LF units are proposed behind residences located on Eagle Lane and Delta Drive, in addition to the 6.1 metre (20 foot) treed buffer to be retained as per Schedule B and clause 6.3.3, the Developer also agrees that no primary building shall be located within 30.5 metres (100 feet) of the property line with residents of Eagle Lane and Delta Drive as shown on Schedule H, except where slopes make this challenging this may be reduced to 24.4 metres (80 feet).

4.7 Multiple Unit Dwellings (R-3)

In addition to the general requirements and the land use provisions of the R-3 zone of the Dartmouth Land Use Bylaw, the following special provisions shall apply:

- 4.7.1 Notwithstanding anything else in this Agreement, there shall be a maximum of 160 apartment units permitted on the Lands.
- 4.7.2 The maximum height of all buildings shall not exceed four (4) habitable floors above an underground parking garage on the higher elevation site (south of Park #4) on Schedule B and shall not exceed five (5) habitable floors above an underground parking garage on the lower elevation site (north of the lakeshore buffer in Park #2) on Schedule B. Where height restrictions have been adopted to protect the airspace around the Shearwater airport, the more stringent requirements shall prevail.
- 4.7.3 No development permit shall be issued for a multiple residential development, unless an application for development permit includes the following information:
 - (i) Elevation drawings showing the proposed design, exterior appearance and materials, and signage;
 - (ii) Site plan showing that a minimum of forty percent (40%) of the required on-site parking is located within the footprint of the building and that outdoor parking areas include landscaping and are designed so as to provide safe and convenient pedestrian access to the buildings they are intended to serve;
 - (iii) Site plan showing walkways extending from the entrances of buildings to a public sidewalk without crossing any driveways or parking areas, or where this is not possible, that such crossings are visibly marked and designed for universal accessibility.
 - (iv) Provision of useable amenity areas (indoor and outdoor) in accordance with the requirements of the R-3 Zone of the Land Use By-law.
 - Landscape plan designed by a Landscape Architect who is a member in good standing of APALA (Atlantic Provinces Association of Landscape Architects) detailing the provision of street furniture, trees, shrubs and other vegetation, lighting,
 - (vi) Existing municipal services and proposed connections
 - (vii) Grading and drainage plan showing that buildings, structures and parking lots have been located on the lot so as to minimize the alteration of natural grades and to minimize the area of impervious surfaces;
 - (viii) Erosion and sedimentation control plan
 - (ix) Stormwater management plan prepared by a Professional Engineer with measures required to prevent the contamination of watercourses and, where possible to allow surface water flows to be directed to permeable surfaces.

4.8 Phasing

4.8.1 The Phasing of the development shall be as generally indicated on Schedule F. Modifications to the Phasing may be permitted by the Development Officer provided all other stipulations of this Agreement are maintained. 4.8.2 The Developer agrees to limit development to not more than two phases at any given time. For the purpose of this Agreement, such limitations shall refer to the completion of all primary services associated with a specific phase. Where the Developer has posted security to the completion of a specific phase, the Development Officer may permit the next phase to commence.

PART 5 ENVIRONMENTAL PROTECTION

5.1 Water Quality Monitoring

A water quality monitoring program for Morris Lake will be carried out by HRM. The Developer agrees to make a cash contribution to this program for each phase of development as specified in section 3.2.5 of this agreement.

5.2 Erosion and Sedimentation Control and Stormwater Management

- 5.2.1 The Parties agree that the Stormwater Management Plan and Erosion and Sedimentation Control Measures provided as Schedule I to this agreement and are intended as general guidelines only. The Developer further agrees, prior to approval of subdivision to submit a detailed Stormwater Management Plan and Erosion and Sedimentation Control Plan. The Plans shall comply with applicable guidelines and regulations of the Nova Scotia Department of Environment and Labour and also the Morris Lake Stormwater Management Plan (Jacques Whitford, 2004) and be designed and implemented with erosion minimization as a primary criterion. In addition, the plans shall contain the following:
 - (a) how ground disturbance will be restricted to areas where structures, roads etc. will exist when construction is complete;
 - (b) indicate which vegetation will be protected, marked, and preserved through construction techniques that minimize soil compaction and damage to tree roots;
 - (c) how the construction project will be phased to minimize the extent and length of soil exposure this includes phasing by drainage area;
 - (d) how the opportunity for erosion will be limited through sequencing of construction activities; and
 - (e) indicate which erosion and sediment controls will be used, where they will be located, the timing of installation (before construction begins), the inclusion of drainage controls up-slope of the construction site; inspection and monitoring, and timing of removal (after the entire site has been stabilized).
- 5.2.2 The Developer agrees to undertake all construction activities in accordance with the erosion and sedimentation control plan, unless otherwise directed by the Nova Scotia Department of the Environment and Labour and also agrees to assume sole responsibility for compliance with all environmental regulations of the Nova Scotia Department of the Environment and Labour.

- 5.2.3 A security deposit in the amount of twenty thousand dollars (\$20,000.00) per phase shall be provided by the Developer in a form acceptable to the Municipality. In the event that two or more phases are under construction at the same time, an additional deposit of ten thousand dollars (\$10,000) shall be provided for each subsequent phase. The deposit shall be provided prior to the commencement of any clearing and grubbing, and may be transferred from phase to phase as development proceeds. The Municipality may use the deposit to remedy any and all environmental problems that may result from development of the Lands. The developer shall be responsible for all costs in this regard exceeding twenty thousand dollars (\$20,000.00). The security deposit or the unused portion of the security deposit shall be returned to the Developer once any environmental problems that result from non-compliance with this Agreement are remedied or where no environmental problems have resulted, upon acceptance of the primary and secondary services by the Municipality;
- 5.2.4 The Developer agrees to provide full-time site supervision during the full construction sequence of each Phase, to ensure that environmental protection measures are properly implemented and maintained.
- 5.2.5 The permanent stormwater protection plan shall be as generally described in Schedules E and I, and shall include comprehensive stormwater separator systems and outfall features. Additional or alternative measures may be approved or required where it is demonstrated that such measures are necessary to fulfill the design objectives of the plan.
- As part of the subdivision approval process, the Developer shall prepare a detailed 5.2.6 Monitoring and Maintenance Program for the stormwater management system. Such program shall require the approval of the Development Officer. The purpose of the program shall be to determine whether or not stormwater leaving the Lands complies with the removal efficiency objectives identified. The program shall indicate the frequency of testing, materials/chemicals tested, analysis methodology, inspection and maintenance schedule (clean-out) for the systems, methodology for maintenance, reporting schedule (including compliance certificate) and any other related matters. The Monitoring and Maintenance Program shall be the responsibility of the Developer, and shall commence upon the installation and operation of the stormwater management facilities and shall continue for a period of #5 years or until a minimum of 75 per cent of the total acreage of the development is complete, whichever is longer. Should it be determined, at any time during this period, that the system is not performing as per design specifications or achieving the identified performance measures, the Developer shall undertake, at his expense, any and all remedial or additional measures necessary, and no additional Phase of development shall be approved until such measures are carried out.

5.3 Vegetation Buffer Zones

5.3.1 A buffer zone measuring a minimum distance of 30.5 metres (100 feet) from the shoreline of Morris Lake, and a minimum 15.2 metres (50 feet) from both sides of both any

Portland Hills PH 4 & 5 DA		Harbour East PAC
Case 00846	- 20 -	June 5, 2006

watercourses (Bell Brook and Brook #2 on Schedule B at a minimum) shall be established and conveyed to the Municipality.

- 5.3.2 If required by the applicable Land Use Bylaw, an additional buffer of 4.8m (16 feet) shall be established outside both 15.2m watercourse buffers and maintained as a private buffer to bring the total amount of buffer to 20m either side for each watercourse. Where any buffer zone is established over privately owned lots the buffer zone shall be shown on a plan of subdivision as a conservation easement with a note on the plan that no vegetation or soils are to be removed or altered unless a buffer zone management plan is approved pursuant to a development agreement entered into with the Municipality;
- 5.3.3 A 6.1 metre (20 foot) vegetation non-disturbance buffer is required along the length of the property line with Innishowen in every phase where shown in Schedule B. Along the backs of properties on Eagle Lane as shown on Schedule H, where it may not be possible to avoid vegetation disturbance, the developer agrees to plant a solid row of evergreen trees in addition to stabilizing the ground surface to prevent erosion. Trees shall be a minimum of 1.5m high at the time of planting and one tree shall be planted every 5 metres. Plant material shall conform to the latest edition of the Canadian Nursery Trades Association Metric Guide Specifications.
- 5.3.4 Except for the nature trails permitted under Section 3.4 of this agreement, no further vegetation or soil shall be removed from the buffer zones unless permitted under a management plan prepared by a qualified professional and submitted to the Dartmouth Lakes Advisory Board for review and appropriate HRM staff for approval.
- 5.3.5 The primary purpose of buffer lands will be as undisturbed environmental protection areas, however, recreational trail development and other passive or active recreational activities may be permitted, provided the primary function is maintained.
- 5.3.6 Any violations of these requirements shall require that the Developer/lot owner replace or reinstate the buffer area to its original condition, or approved equivalent, at his/her cost. In order to efficiently and effectively implement the above, the Developer shall undertake the following:
 - (a) all subdivision plans, survey drawings and location certificates shall describe, as a separate parcel, that portion of the lot which is to remain "Buffer", and shall included information concerning restrictions on vegetation removal, grade alteration, building construction and other relevant information
 - (b) the "Buffer" area shall be described in all deeds
 - (c) temporary fencing shall be installed on all lots at the "Buffer" area boundary prior to clearing and grubbing, and such fencing shall remain in place until the issuance of the occupancy permit
 - (d) photograph(s) (digital) shall be taken of each lot's "Buffer" area

Portland Hills PH 4 & 5 DA		Harbour East PAC
Case 00846	- 21 -	June 5, 2006

(e) copies of the above information shall be supplied to the Development Officer and all applicable lot owners

The Development Officer may modify the requirements included under this Section where such modifications serve to equal or better protect any "Buffer" areas on the Lands.

PART 6: AMENDMENTS

- 6.1 The provisions of this Agreement relating to the following matters are identified as and shall be deemed to be not substantive and may be amended by policy of Community Council:
 - (a) Other forms of residential development not identified herein;
 - (b) Variations to the boundaries of municipal parkland dedication provided that a recommendation of approval is received from the Parkland Planner;
 - (c) Major variations to road layout provided overall concept is maintained.
- 6.2 Amendments to any matters not identified by Section 3.1 or elsewhere in this Agreement shall be deemed substantial and may only be amended in accordance with the approval requirements of the <u>Municipal Government Act</u>.

PART 7: REGISTRATION, EFFECT OF CONVEYANCES AND DISCHARGE

- 7.1 A copy of this Agreement and every amendment and discharge of this Agreement shall be recorded at the office of the Registry of Deeds at Halifax, Nova Scotia and the Developer shall pay or reimburse the Municipality for the registration cost incurred in recording such documents.
- 7.2 This Agreement shall be binding upon the parties thereto, their heirs, successors, assigns, mortgagees, lessees and all subsequent owners, and shall run with the land which is the subject of this Agreement until this Agreement is discharged by the Community Council.
- 7.3 In the event that construction on the lands has not commenced within 2 (two) years from the date of registration of this Agreement at the Registry of Deeds, as indicated herein, the Municipality may, by resolution of the Community Council, either discharge this Agreement, whereupon this Agreement shall have no further force or effect, or upon the written request of the Developer, grant an extension to the date of commencement of construction. For the purposes of this section, "commencement of construction" shall mean the pouring of the footings for the foundation.
- 7.4 If the Developer fails to complete the development or portions thereof, or after 10 (ten) years from the date of registration of this Agreement at the Registry of Deeds, whichever time period is less, the Community Council may review this Agreement, in whole or in part, and may:

- (a) retain the Agreement in its present form;
- (b) negotiate a new Agreement;
- discharge this Agreement on the condition that for those portions of the development that are deemed complete by the Community Council, the Developer's rights hereunder are preserved and the Community Council shall apply appropriate zoning pursuant to the Municipal Planning Strategy and Land Use By-law, as may be amended.

PART 8: ENFORCEMENT AND RIGHTS AND REMEDIES ON DEFAULT

- 8.1 The Developer agrees that any officer appointed by the Municipality to enforce this Agreement shall be granted access onto the Lands during all reasonable hours without obtaining consent of the Developer.
- 8.2 If the Developer fails to observe or perform any covenant or condition of this Agreement after the Municipality has given the Developer thirty (30) days written notice of the failure or default, except that such notice is waived in matters concerning environmental protection and mitigation, then in each such case:
 - (a) the Municipality shall be entitled to apply to any court of competent jurisdiction for injunctive relief including an order prohibiting the Developer from continuing such default and the Developer hereby submits to the jurisdiction of such Court and waives any defence based upon the allegation that damages would be an adequate remedy;
 - (b) the Municipality may enter onto the Property and perform any of the covenants contained in this Agreement whereupon all reasonable expenses whether arising out of the entry onto the lands or from the performance of the covenants may be recovered from the Developer by direct suit and such amount shall, until paid, form a charge upon the Property and be shown on any tax certificate issued under the *Assessment Act*;
 - (c) the Municipality may by resolution discharge this Agreement whereupon this Agreement shall have no further force or effect and henceforth the development of the Lands shall conform with the provisions of the Land Use By-law; and
 - (d) in addition to the above remedies the Municipality reserves the right to pursue any other remediation under the *Municipal Government Act* or Common Law in order to ensure compliance with this Agreement.

IN WITNESS WHEREOF the parties hereto have hereunto set their hands and seals on the day and year first above written:

CLAYTON DEVELOPMENTS LIMITED

MUNICIPAL CLERK

SIGNED, SEALED AND DELIVERED IN THE PRESENCE OF:

per:))) per:
per:)) per:
Sealed, Delivered and Attested by the proper signing officers of Halifax Regional Municipality) HALIFAX REGIONAL MUNICIPALIT
duly authorized on that behalf in the presence of: per:)) per:
per:) MAYOR)) per:

)

















2000 FT

1500







Schedule "I"

WETLANDS

There appear to be no significant wetlands beyond the 100' buffer along the shoreline of Morris Lake.

WATERCOURSES/WATERBODIES

The property contains two main streams. A site evaluation was performed by Jacques Whitford Environmental Limited to determine the quality of existing fish habitat and the effect of future development in the area. The results of the evaluation revealed that the streams at the site are considered fish habitat (see attached letter). The watercourses appear to predominantly carry local surface runoff from precipitation events and snow melt. The streams meander across the site and the only proposed alteration to the streams involve piping the streams and filling over with rock from the site (Greywacke) for the purpose of roadway crossings. Any changes to, or work on these streams will require a stream alteration permit from the Nova Scotia Department of Environment (NSDOE).

Morris Lake supports a range of fish species, which are native to the region.

TROPHIC STATUS OF LAKES

The trophic status of a lake refers to the level of plant productivity. With development of the surrounding property the trophic status of the lakes will deteriorate. Higher phosphorus loading would result in an increase in algal growth and depletion of dissolved oxygen. However, as determined by the Griffiths, Muecke Report Morris Lake is generally mesotrophic although eutrophic conditions are evident at the northern end of the lake.

SOIL EROSION

The geology of the site consists of areas of exposed bedrock with most of the site overlain by a glacial drumlin consisting of Lawrencetown till as confirmed by testpit investigations by JWA in March of 2000. The area is considered to have high risk of soil erosion. Imported soil will be limited to top soil needed for landscaping. Standard erosion and Sedimentation control measure will be employed for all erodable soils, see Section 7.0: Erosion and Sedimentation Control Plan.

THE STORMWATER MANAGEMENT PLAN

The objectives of the storm water management plan are as follows:

- Ensure that the quality of the runoff is as close to predevelopment conditions as possible, while ensuring the runoff coefficient does not exceed the industry standard for single family development.
- Prevention of deterioration of adjacent water bodies. Minimize erosion and mobilization of sediments.
- Maximize removal of mobilized sediments on the site.
- Water quality on and leaving the site remain suitable for public health and aesthetic uses.

Schedule "I"

• Reduce the normal post development amount of phosphorous entering the lake through storm water generated on the site by 40%.

STORMWATER QUANTITY/RATE OF FLOW

ML-10 (a) encourages development to reproduce the predevelopment hydrological conditions while (d) and (e) encourage the minimization of disturbance to the topography while preserving and utilizing the natural drainage systems. As it is impossible to achieve (a) without ignoring (d) and (e) it was decided that the important issue in (a) was the quality of the water not the quantity. Therefore, the quality of the water will be the driving force for the design of the storm water system. The Quantity / Rate of flow will be controlled by an overall c-factor of 0.55 which is the industry standard for single family development.

Roof leaders wherever possible will be dropped on the surface to recharge the ground water and minimize the piped flow to the lake.

STORMWATER QUALITY

To prevent deterioration of the water bodies in the area the stormwater runoff will be treated on the site. During construction an erosion and sediment minimization plan will be followed to minimize sediment mobilization. Mobilized sediments will be contained by the use of silt fences and stormwater ponding on site.

Stormceptor systems (or approved equals) will be installed to remove sediments, petroleum products and phosphorous . These systems will be designed in accordance with specifications to treat water to a level suitable for discharge into a Type 2 habitat (i.e. water contains feeding areas, particularly for adult fish, and unspecialized spawning areas, such as that used by minnows).

The design of this system is based on the criteria that the initial ¹/₂" of rainfall during a storm event flushes the site. Therefore, with this initial flow being captured and processed, the remaining runoff can be conveyed directly to the receiving body of water with no concern of contamination.

THE STORMCEPTOR SYSTEM (or approved equal)

A Stormceptor system is a vertically oriented storm water separator that removes oil, sediment and other contaminants in urban runoff. The lower treatment chamber of the Stormceptor system allows liquids with a specific gravity less than water to rise to the surface and suspended solids to settle to the bottom of the chamber. Stormceptors contain an emergency bypass system that allows runoff to directly circumvent the lower chamber and prevent there suspension and scour of settled pollutants. Stormceptor is capable of treating first flush (i.e. the initial runoff during a rain event containing the contaminants that have accumulated on the site.)

Schedule "I"

PROPOSED ALTERATIONS OF THE AREA

Figure 3 shows the proposed alteration to the project site. The total area of the site is approximately 263 acres. The project includes clearing, grubbing and grading of the site and development of the commercial, multiple and residential properties.

The following sections will describe the control plan and maintenance procedures to prevent the occurrence of on-site and off-site erosion and sedimentation.

EROSION AND SEDIMENT MINIMIZATION PLAN

The following is a summary of the plan, see appendix "X" for the detailed plan and Best Management Practices.

Given the highly erodable soils on the site the requirements for erosion and sedimentation control are critical. Therefore, strict compliance with the following procedures are required.

PROTECTION MEASURES DURING SITE DEVELOPMENT

The erosion and sedimentation control plan during construction includes:

- Silt fences, etc. installed before grubbing operation.
- Clean run-on water controlled/diverted by installation of channels, berms, and grading.
- Exposed soil minimized via rapid cover by mulch, gravel etc.
- Soil exposure controlled relative to forecasted weather conditions.
- Site grading to low slopes complete with ponding depression areas and shallow ditches to retain stormwater.
- Monitoring plan set up.

PERMANENT PROTECTION MEASURES

The erosion and sedimentation control plan for permanent stabilization is:

- All disturbed surfaces will be stabilized.
- Parking lot runoff routed through Stormceptor units (or approved equal) for removal of sediments, oils and greases.
- Commercial roof and parking lot ponding to retain peak flows in rain events.
- Periodic inspection of erosion and sedimentation control measures to ensure continued effectiveness.

MAINTENANCE PROGRAM

The maintenance program to ensure the effectiveness of the erosion and sedimentation control plan is as follows:

- Inspection of temporary measures will be performed daily (and during precipitation events) to check for damage. Damaged structures win be repaired.
- Environmental protection structures will be maintained (including removal of silt material) until stabilization of disturbed areas has occurred. The structures will then be removed and the area will be regraded and stabilized.
- Inspection and maintenance of Stormceptor systems (or approved equal) will be performed at a minimum quarterly frequency and per manufacturers recommendations
and as site conditions warrant. This monitoring frequency complete with result reports submitted to the HRM will continue for a two year period, at the end of which it will be reassessed.

Appendix "X"

EROSION AND SEDIMENT MINIMIZATION PLAN

CONSTRUCTION SCHEDULE

Environmental Concern

The probability for erosion and sedimentation on construction sites is highest during precipitation events. According to 30 years records at Shearwater Airport, the greatest amounts of precipitation occur during winter and spring months. The construction schedule for the Portland Hills - Phase I development is from March to May 2000, inclusive.

Soils within the property are classified as Wolfville Soils, which are characterized as sandy clay, loam with high potential for erosion (Griffiths Muecke 1998). Construction on the site must proceed with caution to ensure that the environmental protection measures are adhered to and enforced.

CLEARING AND GRUBBING

Environmental Concern

Clearing activities in the vicinity of a watercourse will cause disturbance of the protective vegetative buffer or riparian zone adjacent to the watercourse and could subsequently lead to erosion of the approach slopes and sedimentation into and the obstruction of the watercourse. For construction projects, there are three categories of erosion and sediment control: runoff controls, erosion protection, and sediment interception.

Runoff controls limit or contain soil movement from the construction site, minimizing raindrop impact on the soil and reducing runoff volume and runoff velocities. Generic controls considered for this Project are discussed below.

Erosion protection measures are used to reduce or eliminate the detachment of soil particles by falling raindrops or to resist sheet or channel flow. These measures are placed on, or applied to, the soil surface and are often used in conjunction with runoff control and sediment interception measures. Erosion protection measures to be used as appropriate in pipeline construction include:

- gravel sheeting;
- mulches;
- tackifiers;
- erosion control blankets; and
- revegetation.

Revegetation is generally used only for permanent protection and often requires another form of temporary protection measure to be successfully established.

The key to managing runoff and stormwater flows is to minimize erosion and sedimentation. Methods for managing stormwater flows include:

- wet and dry pond for stormwater detention;
- infiltration systems;
- engineered stormwater systems;
- onsite detention facilities; and
- constructed wetlands.

Best Management Practice

- Before any clearing or grubbing commences. clearing limits, easements, setbacks, sensitive/critical areas and their buffers, trees and drainage courses will be delineated with flagging tape and enviro-fences. This practice ensures workers can clearly recognize areas to be protected.
- No clearing or construction will occur within the protective green/belts/protected sensitive areas as identified on the development plans.
- To reduce the velocity of runoff, crop residues, plants, and rough soil surfaces are applied to help spread the flow of water over a greater area and into a thin layer.
- Diversion berms are commonly used on slopes to intercept sheet flow on exposed surfaces and to reroute flow into undisturbed areas. Erosion protection is required at the berm outlets. Check dams are a temporary measure constructed in ditches, swales, or chutes to reduce hydraulic gradient and flow velocity, thus minimizing the potential for erosion of the channel.
- Sediment traps and swales or dikes (diversion channels) will be installed around each lot before construction begins to control excavation water and where required to intercept runoff \from sheet flow from entering the disturbed house pad area. Necessary erosion control measures such as interception ditches will be completed prior to clearing of each work site.
- The work site will not be cleared nor will topsoil be removed prior to commencement of construction
- Cleared and graded areas will be limited to minimize the area of exposed soil
- Minimal amount of natural vegetation and topsoil will be removed at each construction site
- Home sites will not be cleared or grubbed until actual construction is ready to commence, with the exception of where bulk excavation is necessary, those areas will be stabilized immediately following the completed excavation.
- Bulk excavation sites will be prepared by the contractor to foundation ready and fully stabilized. For the remaining lots, the extent of clearing and lot development will be designed by the developers consultant and supervised once the house plans are finalized for each lot. This practice avoids unnecessary clearing and grubbing as all house plans and their pads will not conform to the same design.

- Mulches consisting of wood chips, stone or commercial anti-erosion mats will be used to limit erosion on land, which is cleared of vegetation.
- All non-mercantile timber will be chipped on site and used as temporary protective cover over exposed and disturbed areas.
- Grubbed material, which is not used for fill, will be disposed offsite in accordance with Nova Scotia Department of Environment legislation and Halifax Regional Municipal Bylaws.
- The contractor and developer will maintain a stockpile of erosion control material onsite.

GRADING

Environmental Concern

Grading requirements near watercourses can be extensive in housing developments to accommodate lot and street development. Accordingly, slopes may be contoured to allow for the site development. Disturbance of the slopes may cause instability, which could result in erosion and subsequent sedimentation of watercourse and Morris Lake.

Soil loss from slopes may occur even with erosion and runoff control measures. If this soil can enter a waterbody, mitigative measures will be required to intercept it. Methods used to trap sediment include vegetated buffer strips, silt fences, filter berms, and sediment traps.

Best Management Practices

- Construction along the access roads will be sequenced such that each section is to be completed and stabilized before proceeding to the next section unless overlapping work is approved by the project engineer.
- Work along the streets will not exceed 200 metres. The contractor will work continuously until the streets are completed. If work is halted for 5 days, temporary stabilization structures and material will be installed.
- A crushed rock construction entrance will be established to prevent tracking of mud offsite and through the new and adjacent subdivisions.
- Lot grading will entail completion of each lot driveway first and vehicular travel on the lot will be restricted to the driveway. Access to each lot will be restricted to one driveway.
- The driveway will consist of clear stone or gravel to a thickness of three to six inches. If necessary, filter fabric will be laid under the stone if fines are encountered. This surface will be maintained during construction.
- Once the house pad is graded, the exposed pad will be graveled with clear stone. All exposed soil or unworked home sites will be stabilized no more than 5 days upon completion of the construction.
- No mud, debris or other excavation material will be placed on the street. Fill material will not be stored next to the curb. Fill will be piled within the perimeter of the cleared lot (no more than 3 metres around the house pad) until needed for cut lots or landscaping.
- Imported fill material will be assessed to ensure that material is not composed of high percentage of fines.

- All stockpiled fill material will be covered with tarps or other material, which are secure, to protect it from rainfall.
- Diversions will be constructed at the top of each fill slope at the end of each work day, as needed. Diversions will be located at least 0.6 m uphill from the tope edge of each fill. The outlet of diversions, if free of sediment, will be located on undisturbed or stabilized areas when possible. Otherwise, sediment laden runoff must be diverted to a sediment retention structure.
- Sediment traps, smaller than sediment basins, are more easily installed and moved as grading progresses, will be incorporated into the drainage pattern around each house lot. Sediment traps will serve areas less than 2 ha (5 acres). These structures will be placed downslope of the home lots to intercept runoff on relatively level areas or natural depressions.
- Sediment barriers will be used to treat small areas and include enviro-fencing, straw bales, filter fabric, gravel and earth berms. Barriers will be placed below disturbed areas subject to erosion including along the contour of exposed slopes; at the base of a slope; along a street or sidewalk; and at storm drain inlets. Barriers will not be placed in a drainage way with high volume or high velocity.
- All water pumped from ditches, swales or sumps should be discharged away from the watercourse and filtered through a sediment trap, 2 m3 (3 yd3) of class B gravel, filter bag, or undisturbed vegetation to filter out solid material before the water enters the watercourse.
- Silt accumulation along silt fences and swales will be removed regularly.
- Long and steep slopes on the construction site will be minimized to prevent erosional velocities from developing. If long slopes are present, they will be benched to interrupt the flow of water and minimize erosion.

CULVERT INSTALLATION

- A buffer zone will be established along the watercourse by pacing geotextile silt fences on both sides of the channel. Work must be completed in the dry, therefore water will be diverted around the construction site.
- Diversion channels can consist of a ditch lined with polyethylene liners that are properly placed and secured. Sandbags or an impermeable dam will be installed at the inlet to divert the flow. Inlet and outlet protection to prevent erosion and scouring at the ends will be installed.
- Unlimited fording of watercourses by construction equipment will not be permitted.
- Culverts will be properly designed to handle the increased flows as a result of development and comply with NSDOE regulations with respect to the Watercourse Alteration Permit.
- Side banks of the channel will be stabilized and revegetated subsequent to completion of the culvert installation

INSPECTION AND ENFORCEMENT

Environmental Concern

Thorough maintenance of all temporary and permanent erosion and sediment control measures will ensure the integrity of the aquatic resources they protect. Monitoring of the site following major rainstorms will determine that runoff control devices are effective and allow for the removal of accumulated sediment.

Best Management Practices

- With respect to sediment control, all work is to be completed to the satisfaction of the project engineer and HRM.
- On-site inspection will be an active part of any near-lake development and management program. The effectiveness of control measures will be inspected and monitored during rain events and maintained and upgraded as necessary or as directed by the Project Engineer or Environmental Inspectors.
- The Contractor and Project Engineer will incorporate a routine end-of-day check to ensure the integrity of the protection measures.
- Monitoring of meteorological conditions and forecasts as a proactive means will be conducted to minimize the potential for erosion.

RESTORATION AND PERMANENT PROTECTION MEASURES

The final restoration phase is critical for mitigation long-term impacts to watercourses. Clayton Developments will incorporate all appropriate mitigative to ensure proper restoration of the sites adjacent to watercourses and channel of each watercourse.

Environmental Concern

Proper restoration of the watercourses and adjacent areas will minimize post-construction impacts to these areas. Implementation of permanent protection measures such as a stormwater management plan will minimize the volume of stormwater constituents into Morris Lake.

Best Management Practices

- The sites will be reclaimed immediately to limit sustained erosion.
- Vegetative growth or rock facing (riprap) on steep slopes will be restored in al denuded areas by seeding or laying sod.
- Prompt re-establishment of vegetation will reduce the need for costly remedial measures caused by erosion damage to slopes.
- The targets to minimize and reduce contaminant input to Morris Lake will be met through implementation of four control devices that have proven to reduce contaminant inputs. The strategy recommended for this site is to provide an integrated approach to stormwater management that is premised on controlling surface runoff and pollution at the source. Therefore, a hierarchy, or train, of stormwater management practices may include:
 Stormwater lot level controls, which will be achieved using an overflow catchbasin piping arrangement, storage upon the roof and parking lot, Stormceptor oil/water separation units; and end-of-pipe stormwater management facilities which will consist of Stormceptor (or approved equal), and velocity breaks prior to storm water entering the natural water courses.

- Stormwater lot level controls involve measures to store and treat stormwater before it reaches the street conveyance system.

- End-of-pipe stormwater management facilities found to be most suitable for the proposed development for treatment of the stormwater and removal of phosphorous is the Stormceptor (or approved equal) system for the following reasons:

- performance does not depend upon soil characteristics;
- no additional disturbance to the natural areas to create retention ponds or artificial wetlands;
- the performance is definable and measurable; and
- maintenance is simple and the HRM has the equipment required.

HAZARDOUS MATERIAL STORAGE AND HANDLING OF FUELS AND HAZARDOUS MATERIALS

Environmental Concern

Accidental spills of fuels, lubricants or other chemicals may enter watercourse and eventually Morris Lake. Proper storage and handling of these materials should prevent the probability of accidents.

Best Management Practice

- Machinery maintenance will not be performed in or near a watercourse, ditch or storm sewer. Some examples of maintenance include washing out cement mixers, changing oil, greasing, spray painting, cleaning of spraying equipment or painting equipment, etc.
- Any hazardous liquid including fuel and lubricants will be stored in a designated area surrounded by an impervious berm which would contain a spill of the volume of all stored liquid.
- Solid hazardous materials including cement, lime and sulphur should not be stored within 25 m of a watercourse.
- Any spillage of a hazardous material into any watercourse will be reported to the Nova Scotia Department of Environment's Environmental Emergencies 24 Hour Service (424-5620).

CONTINGENCY PLANNING

Extreme Storm Events

Extreme storm events (usually subtropical storms) can result in extensive erosion due to heavy rainfall impact and the associated stormwater runoff. Erosion of approach slopes adjacent to watercourses is to be expected during these events. Watercourse flows can be expected to increase suddenly, possibly exceeding the capacity of ditches, swales and sediment traps. Throughout the course of construction, the Environmental Inspectors must be aware of current meteorological predictions and the potential ramifications. Subject to a review of the construction activities planned for the day and the locations of these activities, the prediction of storm events will result in the suspension in the vicinity of watercourses and wetlands.

Excessive runoff can be mitigated or controlled by the use of additional diversion berms, straw bale check dams, sediment fences and/or sandbag barriers. Additional sediment interception measures such as sediment traps can also be constructed quickly. The CONTRACTOR will ensure that equipment, personnel and required materials will be available for application as required.

Following extreme storm events, Environmental Inspectors, will conduct environmental monitoring in those area deemed at risk. Recommendations regarding erosion control will be made by the Environmental Inspectors as required.

Attachment B: Evaluation of Relevant MPS Policy Criteria

[Note: staff comments are in *bold italics* following each applicable policy. Staff comments only follow those policies considered relevant to development applications as many of the Morris - Russell Secondary Plan policies are self directed (i.e. they spell out what HRM should consider doing irrespective of any development applications)]

MORRIS-RUSSELL LAKE SECONDARY PLANNING STRATEGY

In 1997, Council retained Griffiths Muecke Associates to conduct a Watershed Management Study for Morris Lake. The purpose of the study was to establish a management framework by which to guide future development within the Morris Lake Watershed. The study focussed on determining the existing trophic status of Morris Lake as well as establishing criteria to control phosphorous and sediments from entering the lake and watershed. Although the terms of reference for the study focuses on Morris Lake, many of the recommendations refer to Russell Lake as well because water quality in Morris Lake is intimately linked to the nature of development activities in the Russell Lake sub-watershed. Therefore, recommendations should be considered applicable to the extended watershed that includes both lakes.

The study indicates that Morris Lake, while still in a relatively "healthy" condition, is in danger of becoming eutrophic if development in the watershed proceeds in an environmentally insensitive manner. To prevent Morris Lake from becoming eutrophic, the Morris Lake Watershed Management Plan recommended that a Master Plan be prepared for this area to ensure development occurs in an environmentally sensitive and comprehensive manner. The Master Plan was to address the key issues and constraints to future development within the area such as transportation, municipal services, land use, major recreation lands and linkages, potential school locations, environmental constraints and opportunities and so on.

To develop a Master Plan for the Morris-Russell Lake secondary plan area, property owners, local area residents, the Dartmouth Lakes Advisory Board, and the general public worked together and a public participation committee was established to coordinate and develop the Master Plan. This Committee or a Sub-Committee thereof, would also be responsible for the evaluation of the detailed CDD approval process.

To ensure development within the Morris-Russell Lake area occurs in an environmentally sensitive and comprehensively planned manner, the Morris Lake Watershed Management Plan recommendations should be applied to all undeveloped lands within the area. To prevent the area from developing in an ad-hoc, uncoordinated fashion, a comprehensive development district (CDD) zone will be applied to all undeveloped lands within the Morris Lake watershed and to lands abutting the Highway 111 interchange, acquired by Clayton Developments Limited from Irving Oil Limited, where a new interchange is proposed.

Portland Hills PH 4 & 5 DA		Harbour East PAC
Case 00846	- 25 -	June 5, 2006

ML-1 A Comprehensive Development District (CDD) Zone shall be applied to certain undeveloped lands within the Morris-Russell Lake secondary plan area and to a parcel of land abutting Highway 111, illustrated on Map 9M, to ensure development proceeds in a comprehensive manner and to enable implementation of the Morris Lake Watershed Management policies.

FUTURE DEVELOPMENT WITHIN THE MORRIS-RUSSELL LAKE AREA

Most of the undeveloped parcels of land within the Morris-Russell area could not be immediately developed given existing constraints in various infrastructure systems (transportation system, water distribution system, sanitary sewer system).

Through the Master Development Plan process, existing infrastructure deficiencies were investigated and alternatives proposed. Transportation, environmental protection, land use, and central services (sewer and water) were key issues to be addressed.

Transportation

To address existing and future transportation issues within the Morris-Russell Lake area, the Master Development Plan process first identified the existing transportation issues/concerns and secondly, determined alternatives/solutions to improving the overall transportation network in the Morris-Russell Lake area.

Without improvements to the area transportation network, Portland Street was at or near capacity. To allow for further development around Morris and Russell Lakes either Portland Street needed to be upgraded or modified to handle the additional traffic or alternative routes to the Circumferential Highway were required.

A Traffic Impact Study, conducted by Streetwise Traffic Engineering, for Clayton Developments Limited lands on the east side of Morris Lake concluded that "there are limited opportunities to increase capacity on Portland Street without a major impact on abutting residential and commercial development". Therefore, the long term development of these lands required alternative routes to Highway No. 111. The study recommended that a new interchange on Highway No. 111 (Circumferential) be established which is supported by Dartmouth's Municipal Planning Strategy. Policy T-6 supports the identification and protection of a right-of-way for an interchange off the Circumferential connecting it with the Russell Lake area.

In 2002, the Municipality identified the Highway 111 interchange as the highest priority for transportation infrastructure financing under the Canada-Nova Scotia Infrastructure Program. Funding was subsequently approved and a functional design study for the interchange undertaken¹. The Province stipulated the interchange location to allow for access to both the Morris-Russell Lake lands and the Woodside Industrial Park via an extension of the Mount Hope Avenue (referenced in this document as "the Caldwell Road Connector").

¹Atlantic Road & Traffic Management. *Final Report: Highway 111 - Cole Harbour Arterial Access Options Study.* July 2004. Prepared for Halifax Regional Municipality.

Portland Hills PH 4 & 5 I	DA	Harbour East PAC
Case 00846	- 26 -	June 5, 2006

The study envisioned that, initially, the interchange would provide access from Highway 111 to Woodside Industrial Park and lands between the highway and Russell Lake by an extension of Baker Drive. Over the longer term, the Caldwell Road Connector would be extended eastward over portions of the Department of National Defense Shearwater Base to Caldwell Road, thereby providing an alternative access to Highway 111 for residential subdivisions around Caldwell Road, as well as residents of Eastern Passage.

A diamond interchange was deemed the most economic design for the Municipality but the consultant established estimates of the maximum traffic loading which could be accommodated while maintaining a satisfactory service level. The consultant stated that the number of vehicles using the interchange could be reduced substantially from typical expectations by including transportation demand reduction measures such as mixed land use developments, improved transit services and walking or bicycle trips.

ML-2 Except as otherwise permitted by policy ML-17, no development shall be permitted within the Morris-Russell Lake secondary plan area unless a new interchange is constructed on Highway 111 and Baker Drive is connected to the interchange or financing for these projects secured and a time frame for completion established. Over the longer term, the Municipality shall work with property owners to extend the Caldwell Road Connector from the new interchange to Caldwell Road. The locations of the interchange, Baker Drive extension and the Caldwell Road Connector shall be as generally shown on Map 9N: Future Land Use and Transportation Plan.

The interchange and Baker Drive connection are under construction

ML-3 The Municipality shall prepare a public transit routing plan for the secondary plan area which reflects the connection established between Baker Drive and the new interchange. The Municipality may require transit related facilities, such as bus bays and transit shelters, be provided on transit routes as a condition of development approvals. In accordance with the draft regional plan, the transit plan should consider establishing a transit hub in the vicinity of Baker Drive and the connector road proposed between Baker Drive and Portland Estated Boulevard West in consultation with the property owners.

No transit related facilities are required in the subject area as all proposed roads are designated 'local' and will not accommodate transit service. A walkway and footbridge are required from Street V to provide direct pedestrian connection to the MetroLink station on Portland Street.

ML-4 A series of trails for pedestrians and cyclists shall be established within the secondary plan area which link residents with commercial, employment and other activity centers and to public transit facilities and, where feasible, to regional trail systems which are developed or planned. Without limiting the foregoing, the Municipality shall establish a multi-use trail between the secondary plan area and the Woodside Ferry Terminal.

Pedestrian hiking trails are provided along the stream corridors and a footpath will be provided along the lake shore. The Bell Brook corridor links to the transit facility on Portland Street. Cycling trails are not provided, however local roads provide adequate cycling connections to the transit facility when combined with the walkway and footbridge at the end of Street V. Staff had

Portland Hills PH 4 & 5 DA		Harbour East PAC
Case 00846	- 27 -	June 5, 2006

identified a preferred alignment for an active transportation corridor or easement from Street S to undeveloped lands to the south (in the same location as the Municipal Service Easement), however the developer did not agree to this and there is no legal mechanism in place to require it.

During the course of preparing the master plan, concerns were heard from area residents about excessive traffic levels on Portland Street and Caldwell Road, as well as short-cutting on local streets. In response, a road hierarchy and phasing plan has been developed and commitments made to undertake various studies.

ML-5 The following road classification shall be applied within the secondary plan area:

- Arterials:Caldwell Rd Connector (Hwy. 111 interchange to Caldwell Rd)Major Collectors:Baker Dr, Eisener Blvd, Norman Newman Blvd, Caldwell Rd from
Atholea Dr to Caldwell Rd Connector
 - Minor Collectors: Portland Estates Blvd, Portland Estates Blvd W, Portland Hills Dr, Caldwell Rd from Atholea Dr to Portland St/Cole Harbour Rd and the proposed connector road between Portland Estates Blvd W and Baker Dr
- ML-6 No street connection shall be established between Caldwell Road and the Portland Hills subdivision.

No through street connections are proposed between Caldwell Road and Portland Hills.

ML-7 Access from Alpine Drive to Portland Street shall be restricted to right-out movement. **This has been completed.**

ML-8 Upon satisfying the requirements to allow for development stipulated under policy ML-2, development shall be permitted on parcels 1 to 13 (as shown on Map 9N) except that no road connection shall be established with Portland Estates Boulevard West until the Caldwell Road Connector has been constructed to Caldwell Road. No further development shall be permitted within the Morris - Russell Lake Secondary Plan Area until the Caldwell Road Connector has been constructed to Caldwell Road unless a traffic study has been undertaken by a qualified consultant which demonstrates that the level of service on Portland Street and Caldwell Road conforms with the performance criteria established under the Municipality's Guidelines for Preparation of Traffic Impact Studies and the road classification established under policy ML-5.

A traffic study undertaken in support of this application adequately demonstrated accordance with HRM performance criteria with minor adjustments to the signal timings at Portland St. and Caldwell Rd.

- ML-9 The Municipality shall undertake studies and implementation plans prior to the completion of the new Highway 111 interchange to address the following matters:
 - (a) Municipal/Provincial initiative to address transportation issues for the Harbour East area;

- (b) the extent to which shortcutting is taking place on streets north of Portland Street, and where appropriate, implement traffic calming measures to mitigate impacts within the affected neighbourhoods;
- (c) potential upgrades to Norman Newman Blvd. to accommodate traffic between Baker Drive and the new Hwy. 111 interchange, while keeping in mind the sensitivity of Russell Lake;
- (d) extending the left hand turning lane from Portland Street onto Eisener Blvd. in order to facilitate additional traffic to Baker Drive via Norman Newman Blvd;
- (e) preparation of a comprehensive transit plan that capitalizes on the new interchange and park and ride facility at Portland Hills Blvd. and Portland St. and the potential for a new transit hub in the vicinity of Baker Drive and the connector road proposed between Baker Drive and Portland Estates Boulevard.

HRM Traffic Services has confirmed that a shortcutting study required under policy ML-9(b) will be undertaken in an attempt to resolve some of the pre-existing traffic concerns in surrounding communities. Functional design of c) and d) above have been completed.

The Caldwell Road connector will traverse lands owned by Imperial Oil Limited where various activities associated with the company's refinery operations have taken place over the years and continue at the time of adoption of this secondary planning strategy. The Municipality acknowledges responsibility for ensuring that the road alignment and design does not adversely affect the operations of Imperial Oil.

- ML-10 The Municipality shall prepare an alignment and design of the Caldwell Road connector in consultation with Imperial Oil Limited. Specific consideration shall be given to:
 - (a) measures needed to prevent unauthorized access to the property from the roadway or adjacent lands while allowing the company access to the water main and pumping station which provide water supply from Morris Lake; and
 - (b) the road alignment in relation to industrial fill and disposal areas on the property.

Central Services (Sewer & Water)

Many of the undeveloped parcels of land within the Morris-Russell Lake area are situated within a municipal servicing boundary, where development can only occur based upon central sewer and water services. The Morris Lake Watershed Management Study recommends that future development within the Morris-Russell Lake area should not proceed by on-site septic systems due to the potential negative impact such systems can have on the lakes. Thus, all new development within the area should be connected to central services (water & sewer).

ML-11 Within the Morris-Russell Lake secondary plan area, it shall be the intention of Council not to consider any new development on lands zoned CDD unless serviced with both central sewer and water services. It shall be the intention of Council to include all undeveloped lands within the Morris-Russell Lake secondary plan area within a municipal development

(service) boundary (Map 9O). No unserviced development is proposed

Within the Morris-Russell Lake area, there are constraints in the existing sewer and water infrastructure systems, yet these deficiencies do not affect all of the undeveloped lands in the same manner. The undeveloped lands on the west side of Morris Lake and the lands adjacent to Russell Lake, are situated within the existing Dartmouth Development Boundary. Lands on the east side of Morris Lake have been included within the Dartmouth Plan Area and Development Boundary as development of these lands can proceed by means of gravity flow to the Dartmouth sanitary sewer system.

The Municipality is currently preparing a wastewater management plan for the Eastern Passage Wastewater Treatment Plant Sewershed. Upon completion of this study and upgrades to the treatment plant, the Municipality should undertake a review of the sanitary sewer service boundary established for this sewershed, particularly in the vicinity of Caldwell Road.

In addition, the Water Commission has indicated that water can be provided to the existing serviceable areas at this time, but not to the entire Morris-Russell Lake area due to pressure levels and water line capacities. Thus, development should not proceed until the necessary upgrades are identified and completed.

The Municipality has undertaken an Integrated Servicing Strategy which identified servicing deficiencies, including central water and sewer services. The Strategy has also identified upgrades or modifications needed in the long term to develop the undeveloped lands within the Morris-Russell Lake secondary plan area. Until such new systems, upgrades or modifications are complete (water distribution system and sanitary sewer system) development within the area should be restricted.

ML-12 It shall be the intention of Council to restrict development on lands zoned CDD within the Morris - Russell Lake secondary plan area, shown on Map 9M, until all infrastructure deficiencies (i.e. water and sewer) are resolved and development can proceed without exceeding the capacity of municipal infrastructure.

There are no deficiencies in the sewage system, as these lands are to be serviced by the Dartmouth, (not Eastern Passage) sewage treatment plant.

- ML-13 The Municipality shall prepare and implement a wastewater management plan for the sewersheds that contain Morris and Russell Lakes. Subject to the availability of funding, the plan shall:
 - (a) improve wastewater system operation and management including safety, regulatory compliance, system capacity both existing and future, physical condition, system reliability and optimization;

- (b) address specific issues of wastewater treatment plant capacity both existing and future, wet weather overflows, odour control, inflow/infiltration remediation, back up power systems, optimizing system performance and making maximum use of available capacity;
- (c) include a prioritized list of actions for implementation, having particular regard for health and safety concerns;
- (d) consider the above recommendations within the context of existing standards, procedures, regulations and compliance requirements, projects, initiatives and priorities, including any adopted under a regional plan.
- ML-14 Commencing on May 25, 2000, new development which is to be served by the Caldwell Road water distribution system shall be limited to two hundred (200) new building lots until system upgrades to the Innishowen Subdivision have been completed. If upgrades are not completed by May 1, 2005, no further development served by the Caldwell Road water distribution system shall be permitted until the system upgrades have been completed.

The Halifax Regional Water Commission has confirmed that deficiencies in the water system have been resolved.

ML-15 Upon completion of a wastewater management plan for the Eastern Passage Wastewater Treatment Plant Sewershed and upgrades to the treatment plant, the Municipality shall undertake a review of the sanitary sewer service boundary established for this plant.

Infrastructure Charges

Following provincial adoption of legislation which allows for the impositions of infrastructure charges to recoup the costs of oversized infrastructure, the Municipality adopted a capital cost contribution policy. The policy applies to all new major areas in the Municipality proposed for new development and shall apply to lands within this secondary plan area.

ML-16 The Municipality shall implement infrastructure charges to this secondary plan area under the Subdivision By-law in accordance with the policies for infrastructure charges established under the capital cost contribution subsection of the implementation section of this Municipal Planning Strategy.

Infrastructure charges are required to be implemented prior to issuance of subdivision approval under the development agreement

Immediate Development Potential

Prior to completing the master planning process, Clayton Developments Limited had existing development rights on approximately 131 acres of its land holding for serviced residential lots. In recognition of these existing rights, the Municipality adopted interim policy provisions and entered

Portland Hills PH 4 & 5 DA		Harbour East PAC
Case 00846	- 31 -	June 5, 2006

into a development agreement with Clayton Developments Limited to permit development over 131 acres. The Municipality will continue to honour this agreement. Any further amendments will be subject to any applicable policies adopted for this secondary plan area as well as the entire community.

ML-17 The Municipality will honour all commitments made under a development agreement for Portland Hills on 131 acres of land adjacent to Portland Street and Innishowen Subdivision. Any further amendments to this agreement shall only be considered where such amendments conform with all applicable provisions adopted under this secondary planning strategy and any general provisions applicable under this municipal planning strategy.

All phases have received subdivision approval under an earlier development agreement.

Future Land Uses

- ML-18 The Future Land Use and Transportation Plan, presented as Map 9N, shall provide overall guidance for land use allocation within this secondary plan area and the following guidelines shall be adhered to in any development agreement application:
 - (p) Parcels PH4 and PH5: These parcels may be developed with a mixture of residential uses consistent with the established pattern of development elsewhere throughout the Portland Hills subdivision;

The proposed development is consistent with the established pattern of development elsewhere in the Portland Hills Subdivision

Density

- ML-19 The allowable density on parcel 1shall conform with the requirements of clause (a) of policy ML-18 and the allowable density on parcel 8 shall conform with the requirements of clause (i) of policy ML-18. The density limitation established under clause (d) of policy H-3B shall be applied to the following aggregated parcels:
 - (a) parcels 2, 3, 4, 4a, 5, 7 and 8;
 - (b) parcels 9, 10, 11, 12 and 13;
 - (c) parcels 20, 21 and 22;
 - (d) parcels MLE1, MLE2 and 18;
 - (e) parcels PH4 and PH5.

Density (4.5 units per acre) is in accordance with H-3b (8 units per acre maximum)

- ML-20 On parcel 6, a maximum population of 4,200 persons equivalent and a maximum of 950 apartment units shall be permitted. For the purpose of determining persons equivalent, a gross density of 40 persons per acre shall be assumed for all commercial developments and 2.25 persons per apartment shall be assumed.
- ML-21 Incentives may be introduced in support of affordable housing. Without limiting the generality of this statement, bonus densities might be considered for properties on transit

routes and near employment centres provided that such incentive is voluntary and does not result in excessive concentration of housing or housing types in any area.

Parkland and Open Space

In addition to parcels identified for recreational purposes under policy ML-18, lands are to be acquired for trail development, particularly along lake shores and watercourses. Lake shore buffer areas will be sought throughout the secondary plan area with emphasis placed on securing public ownership. The Municipality shall also encourage developers to assist in the development of active recreation parks by undertaking site preparation and installation of recreation equipment. In exchange, the normal land dedication requirements may be reduced.

- ML-22 The Municipality shall acquire lands for public trails with emphasis on locations adjacent to lakes and watercourses. The following specific criterion shall be applied to any development agreement application:
 - (a) no more than 50 percent of the lakeshore within each development agreement application shall be privately owned;
 - (b) where private lakefront ownership is proposed, adequate alternative pedestrian links are provided from the publically-owned lake front buffer area through a street or walkway system and back to the lakefront;
 - (c) the determination of private versus public lake front ownership shall be negotiated through each development agreement application on a case-by-case basis;
 - (d) stormwater treatment facilities may be located on municipal lands but shall not be located on municipal parkland;
 - (e) lands which face severe topographical constraints or contain severe environmental characteristics may be considered for public parkland dedication in accordance with municipal parkland guidelines.
- 100% of both lake shore and watercourse buffers are to be publicly owned. Rudimentary nature trails and footpaths are being constructed by the developer and HRM reserves the right under the agreement to upgrade the width and surface treatment of these paths to accord with the future Active Transportation Plan, provided the primary role as environmental protection areas is not substantially diminished.
- CDS units are located outside of designated neighbourhood parks.
- Additional lands have been accepted as public parkland, including several steep slopes, in addition to level areas to be designated as neighbourhood parks.

ENVIRONMENTAL PROTECTION MECHANISMS

As development occurs within the Morris-Russell Lake secondary plan area, all new development must adhere to specific environmental protection measures if both Morris and Russell Lakes are to be protected. The Morris Lake Watershed Management Plan made a number of recommendations

on a management framework by which to guide future development within the area. To ensure the recommendations are implemented, all new development must adhere to the following requirements.

Design and Development Controls

The design adopted for a subdivision fundamentally affects the hydrology of the site and the quality of the stormwater. Good environmental planning integrates site design and stormwater quality management into one process². If environmentally responsible watershed policies are not supported by environmentally responsible design at a subdivision and site level, the whole endeavour may ultimately fail. The Morris Lake Watershed Management Plan recommends that all development adhere to environmental standards designed specifically to protect Morris Lake and its watershed.

- ML-23 It shall be the intention of Council to encourage all new development within the Morris-Russell Lake secondary plan area to meet certain basic design objectives as follows:
 - (a) to reproduce the pre-development hydrological conditions;
 - (b) confine development and construction activities to the least critical areas of the site and consider clustered development to minimize land disturbance;
 - (c) maintain the overall desired density of development by allocating higher densities to areas most suitable for development;
 - (d) minimize changes to the existing topography; and
 - (e) preserve and utilize the natural drainage system

Matters of pre and post development hydrological conditions are addressed by the Nova Scotia Department of Environment and Labour in their review. Several steep slope areas will be avoided, and extensive areas are to be designated where vegetation is not to be disturbed. Multiple unit and condominium townhouse ("lifestyle" units) are clustered in the lower, flatter parts of the site.

- ML-24 It shall be the intention of Council to require all new development situated on lands zoned CDD within the Morris-Russell Lake secondary plan area to incorporate specific design standards which maximize the protection of water quality in Morris and Russell Lakes. The following shall be used as guidelines:
 - (a) all lands with slopes of 15% or greater should not be developed unless additional environmental control measures are implemented to minimize the amount of erosion generated from the site;
 - (b) all wetlands (as defined by the presence of characteristic wetland vegetation) should be excluded from development;
 - (c) all shorelines should be protected by a 100 foot buffer zone except that the width of the buffer zone may be decreased to 75 feet if, through detailed study, the topography and vegetation conditions warrant the reduction. Within the buffer zone, no vegetation or soil shall be removed or altered unless under a management plan has been approved to provide for restoration of vegetation, shoreline access paths, view corridors, habitat management, safety and welfare or shoreline recreation where such provisions may be

² Stormwater Management Practices Planning and Design Manual, Ontario Ministry of Environment and Energy, 1994

made without adversely affecting the primary purpose of preserving water quality in the lake. Any study or management plan submitted pursuant to this clause shall be prepared by a person qualified to make the required determinations and an approval procedure shall be established under the terms of a development agreement;

- (d) all wetlands and watercourses should be protected with a buffer strip within which no vegetation or soil should be removed or altered unless approved under a management plan approved pursuant to the provisions of clause (c). For wetlands, the buffer strip should be at least 25 feet in width for wetlands less than 0.5 acres in size and 50 feet for wetlands over 0.5 acres. All streams shall have a minimum 50 foot buffer strip on each side;
- (e) the amount of impermeable surfaces created should not exceed 25% of the gross area of the proposed development. Minor increases in this figure may be considered provided the amount of proposed undisturbed land substantially exceeds the guideline described in section ML-11(f) and such undisturbed lands are incorporated into the final drainage plan;.
- (f) a minimum of 25% of the natural vegetation on the site should be retained in an undisturbed state and incorporated into the final drainage plan;
- (g) the public, landowners, developers and the Municipality are encouraged to maximize phosphorous reduction to the fullest extent possible through the use of best management practices as recommended by the Morris Lake Stormwater Management Plan (Jacques Whitford, 2004); and
- (h) no development shall be permitted on septic systems.
- There are no significant wetlands beyond the 100' buffer along the shoreline of Morris Lake.
- All of the lake shoreline is protected by a 100' buffer (this is exceeded in parts) and final trail design will be done under a management plan that ensures that buffer integrity will be maintained.
- Impermeable surfaces are proposed for 21% of the total acreage.
- Large areas of lands (in excess of 25%) are to be designated non-disturbance zones.
- For the most part, steeply sloped areas are to be avoided. Where this is not possible additional measures will be implemented to minimize erosion.
- Areas of challenging terrain have been avoided. The high density cluster is located in the most conducive area relative to topographic conditions. Large areas are to be designated non disturbance some will be conveyed as public open space, others will be private. Non disturbance areas will be surveyed as part of the subdivision approval process. The integrity of these areas is to be maintained through protective covenants. The above not withstanding, hurricane and beetle damaged trees and vegetation may be removed under the development agreement under a management plan and the supervision of a trained professional arborist.

Erosion and sedimentation control is a critical element in good site design. In order to control the adverse effects of sediment (and attached phosphorus), it will be essential to strictly control erosion. This means that development will have to be designed and implemented with erosion minimization as a primary criterion.

- ML-25 Within the Morris-Russell Lake secondary plan area, it shall be the intention of Council to require all developers to prepare and receive Municipal approval for an Erosion and Sediment Minimization Plan prior to any clearing or grubbing occurring on a site, and the plan shall contain the following:
 - (a) how ground disturbance will be restricted to areas where structures, roads etc. will exist when construction is complete;
 - (b) indicate which vegetation will be protected, marked, and preserved through construction techniques that minimize soil compaction and damage to tree roots;
 - (c) how the construction project will be phased to minimize the extent and length of soil exposure this includes phasing by drainage area;
 - (d) how the opportunity for erosion will be limited through sequencing of construction activities; and
 - (e) indicate which erosion and sediment controls will be used, where they will be located, the timing of installation (before construction begins), the inclusion of drainage controls up-slope of the construction site; inspection and monitoring, and timing of removal (after the entire site has been stabilized).

An Erosion and Sedimentation Control Plan has been in place for the first phases of Portland Hills and will be extended into this phase. Final details are to be submitted with subdivision application prior to construction approval.

Public Awareness and Education Programs

If the recommendations contained within the Morris Lake Watershed Management Study are to be successfully implemented there needs to be active involvement of both individual land owners and the general public. The involvement of the public should not just be limited to the residents of Morris-Russell Lake area but to existing developed areas within the entire Morris Lake Watershed, such as the existing development throughout Woodlawn.

- ML-26 It shall be the intention of Council to establish a Public Awareness and Education program for the general public which emphasizes the protection of Morris and Russell Lakes. The programs should at least incorporate the following:
 - (a) information programs for land owners on buffer zone management and the use of fertilizers;
 - (b) a program for local schools;
 - (c) application of an Animal Defecation By-law throughout the entire watershed area and actively enforce it;

- (d) encourage local property owners to hold "Cleanup" days for litter collection in public areas; and
- (e) establish a stormwater wetland as an educational demonstration site on the importance of protecting lakes.

Stormwater Management

As the Morris-Russell Lake area is developed, there will be a need for stormwater to be controlled to remove sediments and phosphorous. The Municipality commissioned a stormwater management plan for Morris and Russell Lakes³. The plan contained recommendations regarding structural and non-structural approaches for stormwater management and implementation strategies for both new and existing development.

ML-27 Any development agreement application within the Morris-Russell Lake secondary plan area shall adhere to the recommendations of the Morris Lake Stormwater Management Plan (Jacques Whitford, 2004). All government works within the Morris Lake Watershed shall also adhere to the recommendations of this plan and, where feasible, the plan recommendations shall be applied to existing development within the watershed.

The whole of Portland Hills is (all 275 acres) is governed by a Storm Water Management Plan. The plan was prepared by Jacques Whitford Ltd and includes many HRM and NSDEL supported approaches to stormwater treatment (CDS units, temporary detention ponds, silt fencing, etc). Final details will be submitted with the subdivision application prior to construction approval.

ML-28 Within the Morris Lake Watershed, as illustrated on Map 9M, where applications are received for the expansion of existing or new commercial, institutional and multiple unit residential buildings, or for proposed grade alterations on such properties, it shall be the intention of Council to require the developer, where possible, to prepare and implement stormwater remediation measures to improve water quality entering the Morris Lake system.

Drainage from the condo townhouses and one of the multiple unit residential buildings will be incorporated into the public storm sewer and will be supported by the required CDS units. The multiple unit building adjacent to Morris Lake will be served by a privately owned CDS unit before on-site stormwater from the parking lot is discharged to the lake. Surface parking areas will be minimized by requiring a minimum of the parking to be provided indoors or underground.

ML-29 Where deemed appropriate, the Municipality shall undertake stormwater wetland projects in the waters of Ellenvale Run and at appropriate locations throughout the watershed area. Also, Council shall, through the CDD approval process, negotiate with applicable land owners to establish similar wetland projects at appropriate locations within the watershed.

³ Jacques Whitford Environmental Ltd. & Associates. Morris Lake Stormwater Management Plan: Final Report to Halifax Regional Municipality. March 2004.

Monitoring

The eutrophication process is gradual and takes place over many years. Its progress will be seen in the extension of vegetation in shallow areas and the seasonal occurrence of algae. In the Morris Lake Watershed Study, a Phosphorous Loading Model was used to determine the relationship of the lake phosphorous inputs to trophic status.

The Model determined that Morris Lake is currently mesotrophic and is within 10 to 15 percent of the eutrophic boundary. Thus, the amount of land developed within the watershed should be controlled to prevent Morris Lake from reaching a borderline eutrophic state. The actual amount of land that can be developed can only be determined by undertaking a well designed lake monitoring program and adopting a preset maximum permissible limit for total phosphorous. If the results indicate that Total Phosphorus continues to increase, the watershed management plan will have to be revised and development controls strengthened.

- ML-30 A water quality monitoring program shall be undertaken for Morris and Russell Lakes to track the eutrophication process. The program is to be designed and undertaken by qualified persons financed in whole or in part by developers within the secondary plan area. Specifics of the program are to be negotiated under the terms of a development agreement in consultation with the Dartmouth Lakes Advisory Board. The monitoring program shall:
 - (a) specify the duration of monitoring for the pre-construction, construction and postconstruction phases of development;
 - (b) specify the physical and chemical water quality indicators to be measured, the location and frequency of testing and the format of submissions to the Municipality in each phase referenced under clause (a);
 - (c) establish eutrophication threshold levels for the lakes which would be used as a basis for reevaluating watershed management controls and future development potential within the area;
 - (d) conform with all water quality policies, specifications, protocols and review and approval procedures approved by Regional Council.

Due to the relatively small proportion of the watershed represented by the proposed development, an agreement was reached with the developer that HRM would undertake the monitoring program and the developer would contribute to the costs of undertaking the program. The cost sharing arrangement is spelled out in the development agreement.

ML-31 Pursuant to policy ML-30, in the event the critical water quality threshold levels for Morris or Russell Lakes are reached, it shall be the intention of Council to immediately undertake a review of existing plan policies contained herein and determine an appropriate course of action respecting watershed management and future land use development in the area. Critical water quality thresholds shall be made available to the public.

Portland Hills PH 4 & 5 DA		Harbour East PAC
Case 00846	- 38 -	June 5, 2006

ML-32 It shall be the intention of Council to undertake a study of habitats and species within the Morris-Russell Lake area.

Maintaining Water Levels on Morris Lake

The water level of Morris Lake should be maintained at a level sufficient for recreational use and to prevent development of excessive shoreline vegetation. In the near future, two possible events may take place that could negatively impact upon water levels on Morris Lake. The first is the decommissioning of Lamont and Topsail Lakes as a source of water supply and secondly, a change in the amount of water extracted from the lake by Imperial Oil.

Presently, Imperial Oil extracts water from Morris Lake to use in its refinery, in the amount of 3.27 billion litres per year which is 20% of its total surplus of water. In the future, Imperial Oil could either increase the amount of water extracted from the lake or the plant could close and no water would be removed. If Imperial Oil removes too much water, this would promote the development of shoreline vegetation which in turn speeds up the eutrophication process in the shallow parts of the lake. If pumping were stopped, the volume of water entering Cow Bay River on an annual basis would increase by 24%. In combination with the additional flow from Lamont and Topsail Lakes, this represents a significant change in hydrology from current conditions and has long term implications for the lake level, at the outlet and Cow Bay River. The impact of these changes are not clearly understood at present. Therefore, a study should be undertaken to determine the types of impacts the above scenarios may have on Morris Lake and Cow Bay River.

- ML-33 It shall be the intention of Council, in association with Imperial Oil Limited and the Provincial Department of the Environment, to undertake a study to determine the impacts of potential changes in the volume of water extracted from Morris Lake (increase or cessation) by Imperial Oil Limited on lake water quality and the impact on the hydrology of the lake and its inflow and outflow systems.
- ML-34 It shall be the intention of Council to monitor the water level of Morris Lake to maintain it at a level sufficient for recreational use and to prevent further eutrophication of the lake.
- ML-35 It shall be the intention of Council to retain all lands in the sub-watershed of Lamont and Topsail Lakes as a conservation area in perpetuity. (RC March 22, 2005 E April 23, 2005)

COMPREHENSIVE DEVELOPMENT DISTRICT (CDD)

The CDD mechanism permits a land owner and the City to negotiate the development standards for a designated property, allowing for more flexibility than offered by zoning and subdivision regulation. In keeping with the City's concerns regarding the residential development of large vacant parcels inside the development boundary, several properties will be designated as CDDs and others may be considered by Council or owners in the future.

Portland Hills PH 4 & 5 DA		Harbour East PAC
Case 00846	- 39 -	June 5, 2006

An important objective in providing for CDDs is to create mixed residential developments, with variety in dwelling type, building design and lot characteristics. In most cases, this mix will be achieved within each CDD. However, some districts may be located in the immediate vicinity of alternate housing forms and in these cases, the surrounding neighbourhood will be taken into account in determining an acceptable mix of housing for the property. (Deleted - Reg.Council - Jan12/99, Effective - June26/99)

CDDs will be developed according to master plans and implemented by development agreement(s). Policies H-3 through H-3E expand on City Council's intentions in providing for CDDs. (As amended by By-law C-697, June 18, 1993).

- Policy H-3 It shall be the intention of Council to establish a comprehensive development district (CDD) within the land use by-law. A CDD may be applied to vacant lands which have a minimum area of ten acres and which are located within the development boundary. It is the intention that a CDD shall be primarily a residential development and shall provide a mix of residential uses. Within the CDD, Council may consider permitting any residential use and institutional, commercial and recreational facilities to serve the area.
- H-3(AA) It shall be the intention of Council to establish a Public Participation Committee upon the Municipality receiving an application to develop lands within a CDD. The composition of the Committee should include local residents, other interested citizens, affected land owners, the proponent and municipal staff. The general purpose of the Committee is to collaborate to produce the conceptual plans and detailed plans for the area to be developed, as described by Policies H-3A, H-3B and H-3C. Council shall also establish a Committee to deal with substantial amendments to CDD Agreements.

A Public Participation Committee (PPC) was established to collaborate to produce concept plans for this development as described in the background section of this report. Their final report will be forwarded to Council.

- Pursuant to section 56 of the Planning Act, development within a CDD shall be Policy H-3A subject to an agreement. Prior to considering any agreement within a CDD, Council shall require a concept plan for the entire land holding. The concept plan shall include the following information, some or all of which may be made part of any agreement as Council deems necessary to fully describe and control the development:
 - a map(s) and assessment of the physical nature of the land, including its topography, (a) mature vegetation, natural features restricting development and any significant environmental characteristics:
 - a transportation plan, including vehicular, pedestrian and public transit systems, and (b) traffic impact analysis sufficient to evaluate the internal and off-site implications of the systems;

Portland Hills PH 4 & 5 DA		Harbour East PAC
Case 00846	- 40 -	June 5, 2006

- (c) the method of providing municipal sewerage, water and storm services to the development;
- (d) the general phasing of development;
- (e) the distribution and nature of all land uses; and
- (f) the total number of dwelling units, the proportion of all units which are proposed to be in apartment buildings and the gross residential density of the whole development and each of its phases.

All relevant information has been submitted and reviewed, and can be found as schedules to the attached development agreement.

- Policy H-3B In addition to the provisions of Policy H-3A, Council shall consider the following prior to approving any agreement within a CDD:
 - (a) the adequacy of the mix of residential uses to provide a range of housing options in terms of lot characteristics, building and dwelling type and design;
 - (b) the general guide that the maximum number of apartment units shall not exceed 40% of the total actual number of units within the CDD. Such figure may be increased to a maximum of 50% provided clear advantages are gained within the CDD by means of increased parkland or open space, increased areas of undisturbed terrain and vegetation, decreased amount of impermeable surfaces and/or improved environmental protection or an improved transportation system. (RC March 22, 2005 E April 23, 2005)
 - (c) the location and concentration or dispersal of multi-unit residential buildings with respect to impacts on street networks, abutting uses and the physical environment;
 - (d) the general guide of a maximum residential density of 8 units per gross acre, excluding acreage devoted to commercial use;
 - (e) the compatibility of various land uses, within and adjacent to the development, and measures proposed to integrate and buffer uses. Compatibility refers to the type of land use, dwelling (housing) type and size and height of the development. Buffering refers to measures that mitigate impacts on adjacent uses, such as adequate separation distances, retention of existing vegetation and the installation of suitable screening features such as new vegetation, berms and or fencing;
 - (f) the adequacy of measures to minimize disruption of existing terrain, vegetation, watercourses and other physical features and to mitigate against the potential effects of disruption;
 - (g) the hours of operation of non-residential uses, including business uses located in dwellings;
 - h) the safety and efficiency of all transportation systems, including the effects of driveways to and traffic from abutting uses to streets and walkways including the adequacy of pedestrian facilities (sidewalks/walkways);

- the general guide that street frontage for single detached development not be less than forty (40) feet and that the total number of single detached lots having street frontage less than the minimum requirement <u>as prescribed by the land use by-law and/or the</u> <u>subdivision by-law</u> (Regional Council-January 29, 2002, Effective-March 2, 2002) not exceed twenty-five percent of the total number of single detached units within the CDD;
- (j) that the size and type of commercial uses be designed to serve the shopping needs of residents within the local area, rather than the community or the region. Commercial uses to be considered are to be compatible with and sympathetic to the character of the surrounding residential community in terms of location, use, scale, design and traffic impacts. Uses to be considered may include, but not limited to, offices, financial institutions, convenience shops,

drug stores, personal service outlets (dry cleaning depot, laundry mats, hair salons, tailors and so on), small food stores, gas bars, and restaurants (excluding drive-throughs). Uses not to be considered include, but are not limited to department stores, home improvement centres, drinking establishments, adult entertainment uses and large grocery stores;

- (k) Notwithstanding criteria "j", larger commercial development containing a wider range of uses may be considered for lands adjacent Highway 111 at the proposed Woodside interchange;
- (1) within the Morris-Russell Lake area, all new development shall adhere to the Morris Lake Watershed Management policies as contained in Policies ML-1 to ML-23 as applicable;
- (m) the impact the proposed development may have on the quality of life of existing neighbourhoods, and notwithstanding criteria (b),(d),(i),and (j), Council may reduce the maximum allowable under each criteria in order to protect the quality of life of residents within existing neighbourhoods;
- (n) any and all other matters applicable to the subdivision and servicing of the lands, the provision of parkland and the effects of the development on community services as set out in policy IP- 1(c) and, for specific uses which are otherwise subject to development agreements, the specific considerations required by the text and policies of this Plan; and

The mix of housing types is adequate as a range of housing options are to be supplied. Multiple unit dwellings make up no more than 40% of the total number of dwellings. The proposed density is 4.5 units per gross acre, well under the CDD threshold of 8. The proposed uses represent an extension of the existing pattern of development and is deemed compatible. Watercourses are protected by buffers consistent with Morris Russell Lake Secondary Plan policy and draft Regional Plan policy. Adequate pedestrian facilities are provided including a number of walkways, footbridges, and nature paths. Street frontage for single unit dwellings will be no less than 40 feet. All matters applicable to subdivision, servicing, parkland etc. have been addressed.

Policy H-3C	For each phase of development in the CDD, detailed site plans shall be submitted. In addition to the provisions of any agreement pursuant to Policy H-3B, detailed site
	plans shall provide the following information:
(a)	the design, exterior appearance, signage, elevations and landscaping of multi-unit buildings, institutional buildings and commercial buildings;
(b)	the dimensions of all yards and the physical nature of measures to integrate or buffer adjacent uses;
(c)	the details of layout, lighting and landscaping of parking areas for multi-unit residential development, institutional and commercial development;
(d)	the provision of useable amenity areas including indoor and outdoor recreational facilities for multi-unit residential developments;
(e)	a tentative subdivision plan showing all municipal services and proposed building locations;
(f)	grading plans or other information regarding the method of developing, protecting or restoring significant physical features of the site during construction;
(g)	a projected time frame for construction;
(b) (h)	the location, size and number of vehicular access points to all developments;
(i)	landscaping and maintenance plans for multi-unit residential, commercial and institutional uses;
(j)	the details of street scape aesthetics (landscaping, street trees, etc.); and
(k)	any additional information required to be able to assess the proposal in terms of the concept plan and any approved development agreements.
The developm	ent agreement requires detailed site plans to be submitted in accordance with the
	or to issuance of permits.
Policy H-3D	It shall be the intention of Council that all or part of an agreement made pursuant to policies H-3A, H-3B and H-3C may be discharged upon completion of the development or upon completion of particular phases of the development. Upon

Policy H-3E It shall be the intention of Council to consider the zoning of lands within the Plan area that meet the criteria for a CDD by amendment to the Land Use By-law. (Reg.Council - Jan12/99, Effective - June26/99)

intent of the agreement or by creating a specific zone for the site.

discharging part or all of any agreement, Council shall zone the lands to reflect the