

M E M O R A N D U M

TO: Chair and Members of Bedford Watershed Advisory Board

FROM: Andrew Bone, Planner

DATE: June 5, 2012

SUBJECT: **Case 17847: Development Agreement for Bedford West - Sub Area 9, Bedford**

Application Case No. 17847 - Application by West Bedford Holdings Limited for the lands of West Bedford Holdings Limited to: a) enter in to a development agreement to permit five multiple unit dwellings and one mixed use commercial / multiple unit dwelling on Innovation Drive (near Gary Martin Drive), Bedford; b) amend the existing development agreement for Bedford West, Sub-Areas 3 and 4 to: i) change the road alignment for Road J in Sub-Area 3 so that it intersects Gary Martin Drive (3-4 Collector) rather than Loop Road 4; ii) to permit small lot single unit dwellings (with a minimum 34 foot lot frontage) on Road J; and iii) relocate a multiple unit building located south of Road 3-I to a location west of the intersection of Loop Road 4 and Gary Martin Drive.

Location The subject properties are located on Gary Martin Drive and Innovation Drive in Phase 3 and 4 of Bedford West.

Designation Bedford West Comprehensive Development District – Bedford West Secondary Planning Strategy

Zoning BWCDD (Bedford West Comprehensive Development District Zone and Bedford West Business Campus Zone– Bedford Land Use By-law

Surrounding uses Undeveloped vacant lands on Innovation Drive, zoned for commercial and office activities. Vacant lands on Gary Martin Drive subject to a development agreement for residential land uses.

Enabling policy

Policies within the Bedford West SPS require all developments (excluding the Business Campus and the expansion of Peerless Subdivision) to be by development agreement. Business Campus lands may be developed as residential, subject to a development agreement. Please find attached relevant policy related to water issues. Further, policy requires that a master stormwater management plan be approved prior to the approval of a development agreement. The management plan has previously been circulated and approval recommended by Bedford Waters Advisory

Board and the applicant has provided letters which indicate that the proposed development agreement and amendments would not affect the storm master plan.

Site features

The subject properties are:

1. A 20.7 acre site located at the west end of Innovation Drive. The site is bisected by Innovation Drive and is immediately adjacent a wetland (near the end of Science Park Drive) which was visited by the Board in March 2012. The site is adjacent HRM parkland which contains a watercourse which flows parallel to Capstone Crescent. This watercourse is outside the typical 20m riparian buffer.
2. The second site is located in Phase 5 of Sub Area 3 and 4 as identified on the mapping attached. The site is currently enabled, under the existing development agreement, as townhouse/ semi-detached or single unit homes and for multiple unit buildings. This site is adjacent an existing park area which contains a watercourse and a wetland. This watercourse and wetland are outside the typical 20m riparian buffer from development.

Proposal

There are two proposals for this site:

- a) Enter in to a development agreement to permit five multiple unit dwellings and one mixed use commercial / multiple unit dwelling on Innovation Drive (near Gary Martin Drive), Bedford;
- b) Amend the existing development agreement for Bedford West, Sub-Areas 3 and 4 to:
 - i) change the road alignment for Road J in Sub-Area 3 so that it intersects Gary Martin Drive (3-4 Collector) rather than Loop Road 4;
 - ii) to permit small lot single unit dwellings (with a minimum 34 foot lot frontage) on Road J; and
 - iii) relocate a multiple unit building located south of Road 3-I to a location west of the intersection of Loop Road 4 and Gary Martin Drive.

Watershed Advisory Board

Pursuant to the Board's terms of reference, the Board's input with respect to the potential impact of adjacent water bodies is requested. Staff has reviewed the proposal and determined that the proposal has the potential to impact storm water management and thus the requests are being forwarded to the board for comment.

The staff report for this application will be prepared in the coming month to be forwarded to North West Planning Advisory Committee and North West Community Council. As such, please identify any comments to be included in the staff report via the board's recommendation, which will be included in the staff report.

Attachments

Map 1	Identification of sites
Map 2	Proposed Sub Area 3 and 4 Land Use Plan
Map 3	Phasing Plan
Map 4	Stormwater Plan
Map 5	Concept Plan – Multiple Unit Dwellings on Innovation Drive
Map 6	Context Plan – Multiple Unit Dwellings on Innovation Drive
Map 7	Site Plan – Multiple Unit Dwellings on Innovation Drive
Letter 1	Stormwater Sub Area 3 and 4
Letter 2	Stormwater Multi Units – Innovation Drive

Attachment A: Policy Excerpt from the Bedford West SPS

THE BEDFORD WEST SECONDARY PLANNING STRATEGY

Background

In 2002, Regional Council directed that a master planning study be undertaken on lands on the west side of the Bicentennial Highway, in the vicinity of Hammonds Plains Road and Kearney Lake Road. The study was initiated in response to requests from two property owners to allow for development on municipal sewer and water services. Annapolis Group Ltd. owned approximately 1,200 acres and proposed to develop a comprehensively planned community while several family members requested municipal approvals to allow for a further 40 acre expansion of Peerless Subdivision with single unit dwellings.

In 2003, Council approved a study area boundary, study terms of reference and a public participation program¹. The study area boundaries, encompassing a total area of approximately 2,600 acres, are illustrated on Schedule BW-1. The terms of reference were to prepare conceptual community plans which:

- anticipate future community needs having regard for trends in demographics, housing affordability, building technologies, economics and social issues with specific consideration given to how the community proposed could fulfill a role in responding to needs within a regional context;
- integrate design with established neighbouring communities in terms of the natural and man made environment;
- reduce travel time and energy requirements, encourage the use of public transit, pedestrian and cycling facilities and enhance public safety through innovative integration of land use components with the transportation and open space systems;
- preserve sensitive environmental areas and unique cultural features and respond to the opportunities and constraints imposed by the environment;
- maintain adequate service levels for municipal infrastructure (sanitary sewer, storm drainage, potable water and road systems) both within the area of new development and off-site while minimizing costs to all parties;
- allow for design flexibility in recognition of future changes to external circumstances/market conditions;
- minimize future demands on the Municipality's fiscal resources (capital and operating budgets) and provide fair and predictable cost-sharing of community infrastructure costs between the Municipality and individual property owners in terms of division and timing in

¹ Details can be found in a staff report re: Bedford West Master Plan (Project 00382), dated January 17, 2003 and presented at the February 25, 2003 session of Regional Council.

- accordance with the Municipality's Capital Cost Contribution Policy;
- provide policy guidance for more detailed negotiations with property owners/developers with specific consideration given to phasing of development with associated community infrastructure and the responsibilities of each party (property owners/developers and the Municipality).

A public participation committee was appointed with citizen representatives from Bedford, Hammonds Plains, and Prince's Lodge/Clayton Park. The committee's mandate was to ensure the public had opportunities to express opinions; collaborate with staff and developers in preparation of a plan; provide advice on policy and regulatory documents proposed; and confer with the Regional Planning Advisory Committee (the RPC).

The Bedford West master planning study was undertaken while a regional planning program that was being prepared under the supervision of the RPC. This secondary planning strategy has therefore been prepared in accordance with the master plan study terms of reference established by Council and in conformity with all relevant regional plan policies being proposed.

Environmental Protection

Lakes and Watercourses

A vast majority of the study area is within Paper Mill Lake watershed which includes Washmill Lake, Quarry Lake and Suzie Lake. Dam structures control water elevations at the outlets of Paper Mill Lake, Kearney Lake and Quarry Lake. The dams which remain under the ownership of Annapolis Group have historically been used for power generation at a turbine on Moirs Mills. Today, the lakes are used for various recreational activities such as swimming, fishing and boating - activities which are highly valued by the surrounding communities and which are dependent upon maintenance of the dams.

Annapolis Group has entered into negotiations with the Province pertaining to the upgrading of the dams and has proposed that control gates be introduced for flood control and storm water management purposes. Two studies: *Bedford Dams Comprehensive Review* (SGE Acres, October 2003) and *Bedford West Stormwater Management Pre-Design Brief* (SGE Acres, March 2004) were submitted by Annapolis to the Province in support of this proposal.

The Municipality supports preservation of the dams and the introduction of flow control mechanisms which reduce flood risks and which further good stormwater management practices provided that lake levels are maintained within ranges needed to sustain recreation activities and maintain shoreline aesthetic. The Municipality also supports an ownership plan to ensure proper long term operation and maintenance of the dams.

Annapolis Group also had two further studies prepared in support of its development proposal: *Water Quality Assessment of Water Bodies Contained in the Bedford West Planing Area Using a Phosphorous Loading Model Approach* (Dalhousie University Centre for Water Resource Studies, April 2004) and *Bedford West Planning Area: Subwatershed Management Plan* (Jacques Whitford, May 2004).

The first study concluded that best management practices may be needed both during development and afterward to maintain a water quality in the lakes that is satisfactory for recreational activities.

Leaching from septic fields from existing development in adjacent areas may also contribute to phosphorous loading and mitigative measures may be needed over the long term. The study recommended that a monitoring program be established on lakes throughout the watershed. The Jacques Whitford study examined the characteristics of the watershed and the proposed development and prepared guidance for more detailed stormwater management plans.

Objectives:

- to undertake storm water management planning on a watershed basis with community design based on natural drainage patterns;
- to prevent flooding of properties and safeguard flood plains;
- to preserve the water quality of lakes and rivers;
- to preserve groundwater flows;
- to support regional initiatives in solid waste recovery, Halifax Harbour remediation and watershed management.

Policy BW-1:

No development agreement shall be approved unless a master storm water management plan has been prepared, reviewed by the Bedford Waters Advisory Board and accepted by the Municipality. The management plan shall:

- (1) identify significant constraints and sensitivities with regard to flood potential, and environmental features and provide appropriate protection measures;*
- (2) provide estimates of pre-development and post development flow rates (where post development flow rate means the expected flow rates upon full build out of an area as permitted by the development agreement) at critical locations within watercourses such as at culverts and other road crossings and at downstream developments;*
- (c) outline the type and location of storm water management facilities and the approach to protecting receiving waters from contamination, excessive flow rates and loss of aquatic habitat and to protect the quantity and quality of groundwater flows; and*
- (d) conform with the recommendations of the Bedford West Planning Area Subwatershed Management Plan (Jacques Whitford: May 2004) unless otherwise acceptable to the Municipality and the Province.*

Policy BW-2:

No subdivision approvals shall be granted unless the detailed design specifications conform with the master stormwater management plan approved under policy BW-1.

Policy BW-3:

A water quality monitoring program shall be undertaken for the Paper Mill Lake watershed, illustrated on Schedule BW-2 to track the eutrophication process. The program is to be designed in accordance with national guidelines established by the Canadian Council for Ministers of the Environment (the CCME guidelines) and undertaken by a qualified persons retained by the Municipality and financed in whole or in part by developers within the watershed area. Specifics of the program are to be negotiated under the terms of a development agreement in consultation with the Bedford Watershed Advisory Board. The

monitoring program shall:

- (1) specify the duration of monitoring for the pre-construction, construction and post-construction phases of development. Pre-construction phase means a period of time before construction activity starts. Post-construction phase means a period of time that commences at full build out of the area permitted by a development agreement. Construction phase means the full time period between the pre-construction and post-construction phase);*
- 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);*
- b) establish physical and chemical water quality indicator threshold levels for the recreational uses of the lakes which would be used as a basis for reevaluating watershed management controls and future development potential within the area. The threshold indicators are to be established prior to any development approvals being granted;*
- conform with all water quality policies, specifications, protocols and review and approval procedures approved by Regional Council.*

Policy BW-4:

Where the Community Council is satisfied that a development agreement application has been made for a development proposal which could not be reasonably expected to impact the quality of water within the Paper Mill Lake watershed, the requirements of policy BW-3 may be waived.

The Community Council shall seek the advice of the Bedford Watershed Advisory Board before granting any waiver.

Policy BW-5:

In the event that water quality threshold levels, as specified under clause (c) of policy BW-3, for Paper Mill Lake or Kearney Lake are reached, the Municipality shall undertake an assessment and determine an appropriate course of action respecting watershed management and future land use development in the area. An assessment shall consider the CCME guidelines. Water quality thresholds and any assessment reports shall be made available to the public.

Policy BW-6:

No stormwater shall be discharged directly into any natural watercourse without the use of mitigative measures as stipulated in under the stormwater management plan and in accordance with municipal and provincial guidelines.

Policy BW-7:

No development, grade alteration, excavation, fill, pavement or removal of natural vegetation shall be permitted within one hundred (100) feet of the high water mark, or within the limits of any 1 in 20 year flood plain of Kearney Lake, Kearney Lake Run or Black Duck Brook or

within sixty-six (66) feet of the high water mark of any other watercourse, or within the limits of any 1 in 20 year flood plain of any watercourse, except as provided for by development agreement in accordance with an approved water management plan approved pursuant to the provisions of policy BW-9 or as provided to allow for trail systems, transportation crossings or utilities.

Preservation of Trees and Environmentally Significant Features:

Objectives:

- to identify, preserve and maintain significant environmental features;
- to protect riparian buffer areas around lakes and watercourses;
- to minimize site disturbance, maximize tree retention and to restore trees over area which have been disturbed by development activities

Policy BW-8:

No development agreement shall be entered into over lands on which trees have been removed except:

- a) as may be required for a bonafide land survey;*
- b) to satisfy any provincial or federal requirements; or*
- c) where, in the opinion of Council, the extent of such cutting would not preclude achieving the three objectives stated above.*

Policy BW-9:

Within any watercourse protection setback established under policy BW-7, no vegetation or soil shall be removed or altered unless a management plan has been approved to provide for restoration of vegetation, shoreline access paths, habitat management, safety and welfare or shoreline recreation where such provisions may be 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.

Policy BW-10:

Wetlands, lakes, watercourses, endangered species habitat and any other features of environmental significance shall be delineated as non-disturbance areas under development agreements. Non-disturbance areas shall be located to allow for continuity of non-disturbance areas on abutting lots, municipal parkland and open space dedications, and natural areas adjacent to watercourses.

Policy BW-11:

A tree replanting program shall be incorporated into development agreements. The program shall specify the locations, number, type and diameter of trees to be planted. The type of trees shall be indigenous to Nova Scotia.

Policy BW-12:

Development of major land areas on slopes in excess of twenty-five percent (25%) shall be prohibited under any development agreement except where it can be demonstrated that such development would not create any hazard and could better preserve open spaces or areas of environmental value.

Policy BW-13:

The Municipality may allow for modifications to the service system specifications adopted under subdivision regulations where such modifications would enhance the ability to preserve the natural environment without compromising the intended objectives of the service systems.



MAC WILLIAMS ENGINEERING LIMITED

109 Chain Lake Drive • Halifax • Nova Scotia • B3S 1B3
Phone (902) 450-1414 • Fax. (902) 450-1424

11564.01

May 24th, 2012

Clayton Developments Limited
255 Lacewood Drive, Unit 100 C
Halifax, Nova Scotia
B3M 4G2

Attention: Kevin Neatt

Dear Keven:

Re: West Bedford, Phase 5, Bedford, N.S. (Larkview Terrace)

As requested, we have reviewed the stormwater design for this overall subdivision in regard to the proposed changes along the Larkview Terrace realignment in relationship with the approved Master Stormwater Management Plans for this area.

In our opinion, the stormwater changes, resulting from the proposed Larkview roadway realignment, remain in compliance with the intent of the Master Stormwater Management Plans that were approved by HRM in 2008. In other words, this drainage area has reached full build out and we have confirmed that it remains in compliance with the original stormwater balancing parameters, with or without this roadway realignment becoming a reality.

We trust the above is satisfactory, however, if you have any questions or comments please do not hesitate to contact us.

Yours very truly,

D. M. Williams, P. Eng.,
DMW/dm



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08610.01

May 16th, 2012

Clayton Developments Limited
255 Lacewood Drive, Unit 100 C
Halifax, Nova Scotia
B3M 4G2

Attention: Scott MacCallum

Dear Scott:

Re: West Bedford Business Campus, Phase 1E & 1G, Innovation Drive, Bedford, N.S.

As you are aware we are currently revising the engineering design drawings for the above noted projects and as such we are also reviewing the original drainage design (40% HRM stormwater regulation) and comparing it to the current HRWC standards of pre-post balancing. As a result of the change in design standards to pre-post balancing, the land usage changes being currently proposed for Innovation will actually result in a slight reduction of stormwater entering the Innovation Drive storm system and the nearby detention pond.

This design criteria change only pertains to the Business Campus lands of Phase 1E & 1G and in our opinion still meets the intent of the Master Stormwater Management Plans that were approved by HRM in 2008. In addition, I should also add that Mark McGonnell (HRM Engineering) is already aware of this pending change and that it results in a slight reduction of storm flows in this general area.

We trust the above is satisfactory, however, if you have any questions or comments please do not hesitate to contact us.

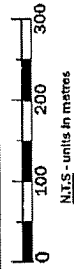
Yours very truly,

D. M. Williams, P. Eng.,
DMW/dm

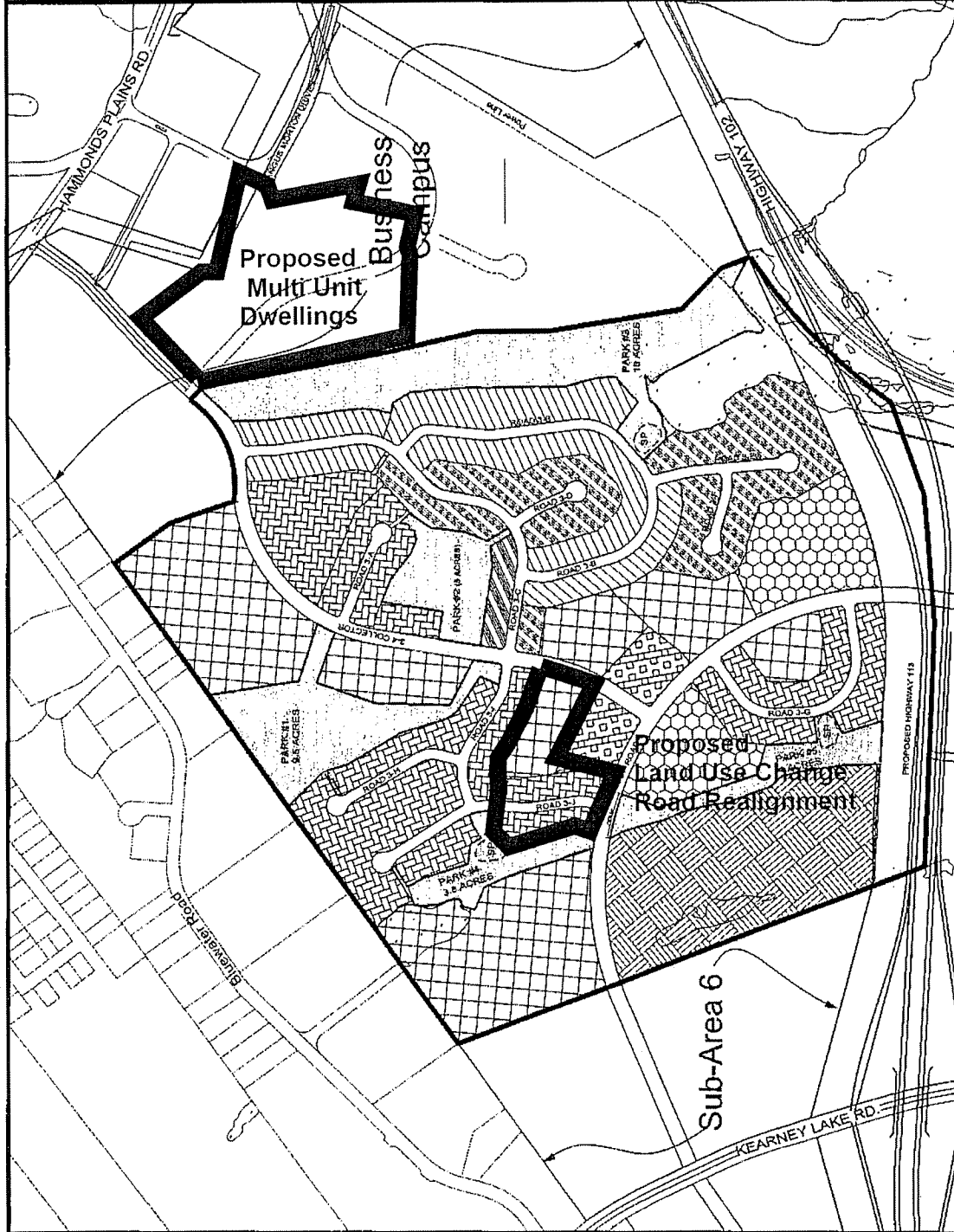


THE PARKS
OF WEST BEDFORD
EMBRACING NATURE... ENJOYING LIFE

Sub Areas 3&4
Feb 2008
Land Use Plan

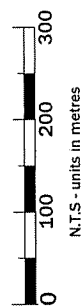


SCHEDULE B							
	SINGLES		SMALL LOT SINGLES (MIN 34ft.)		TOWNHOUSE/SEMI- DETACHED/ SINGLES		MULTIPLE (maximum 6 Storeys)
	MULTIPLE (maximum 12 Storeys)		INSTITUTIONAL / MULTIPLE		COMMUNITY COMMERCIAL		PARKLAND (HRM)





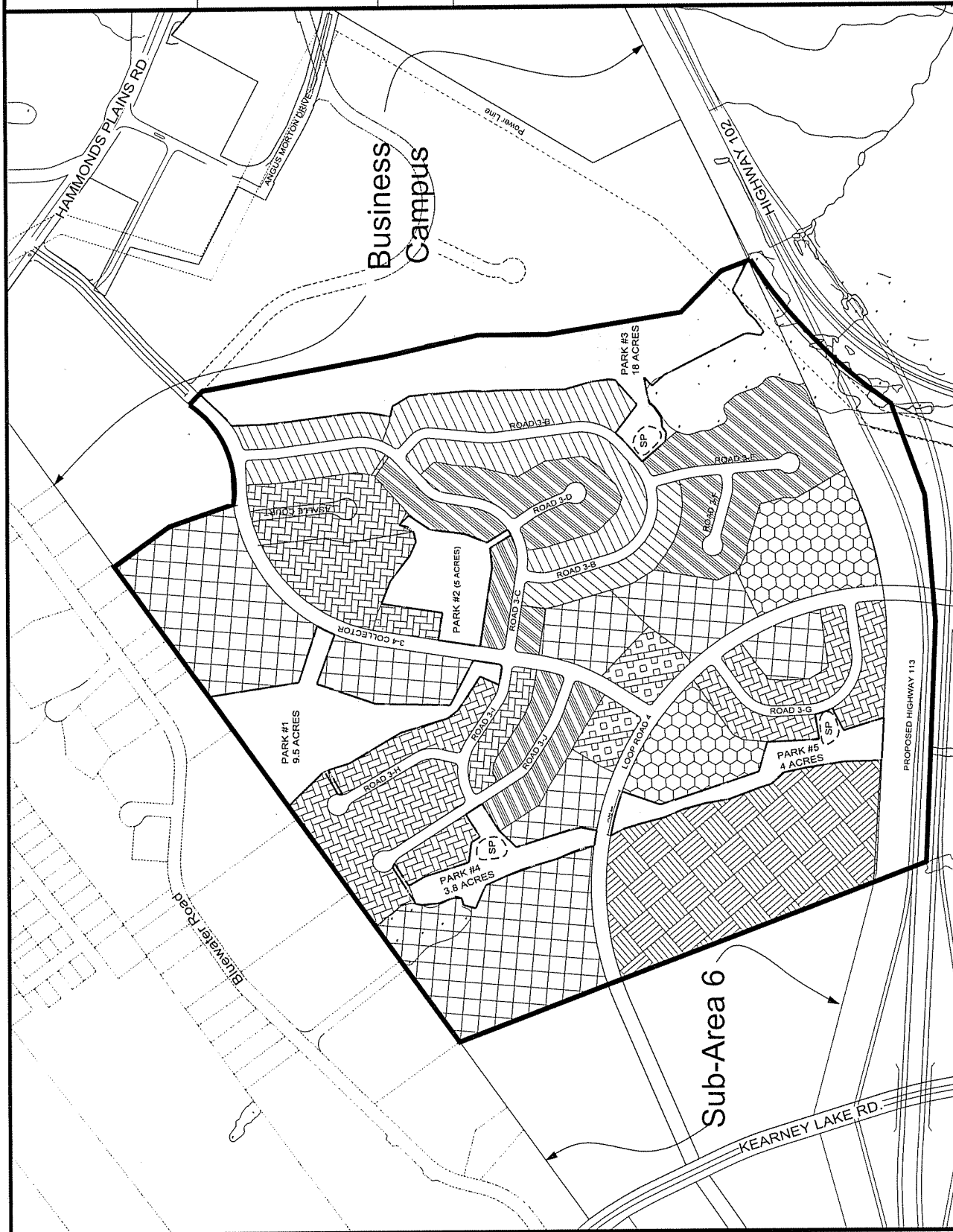
Land Use Plan



N.T.S. - units in metres

PARKLAND
(HRM)

SCHEDULE B





THE PARKS
OF WEST BEDFORD

EMBRACING NATURE'S BEAUTY

Sub Areas 3&4

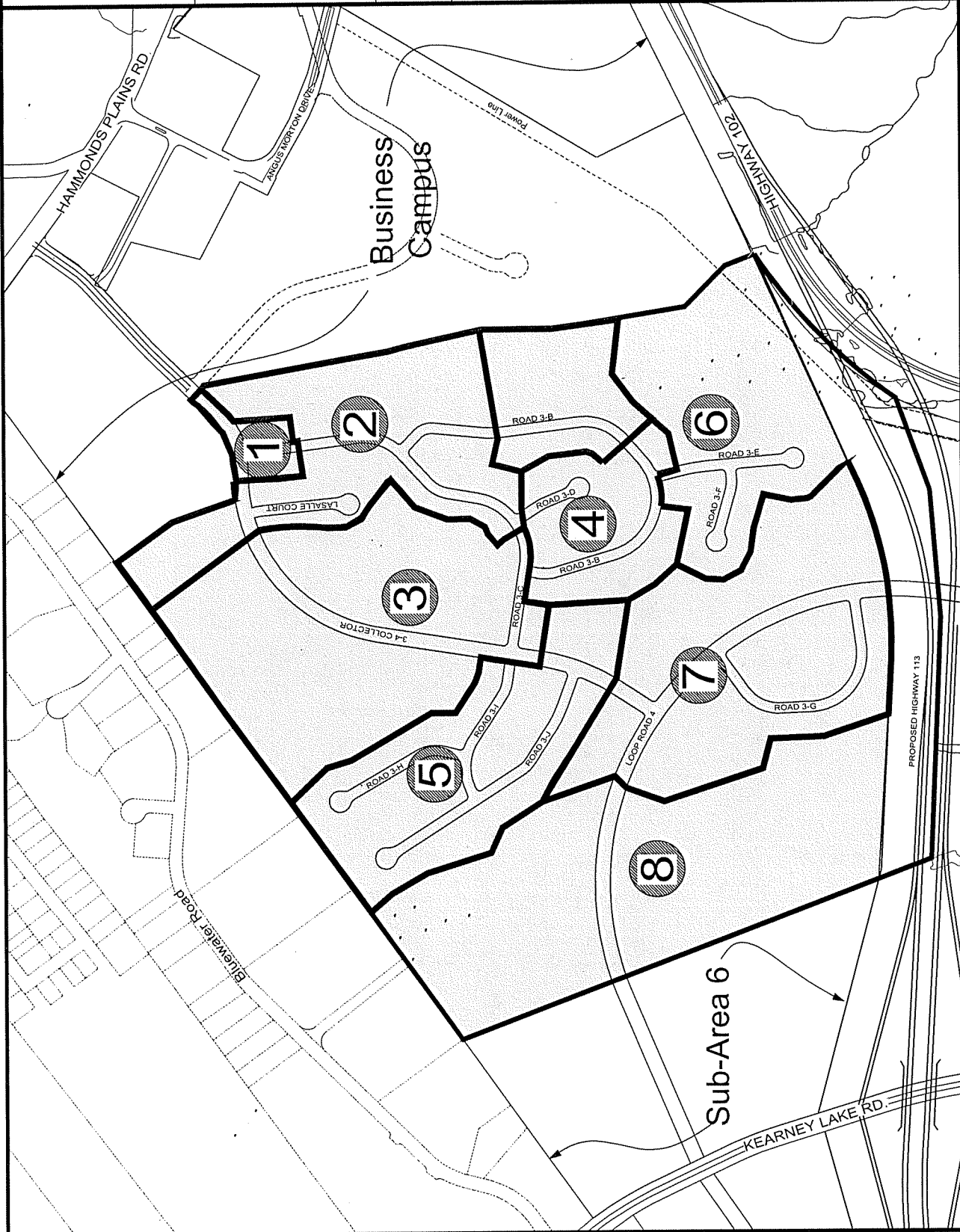
May 2012

Phasing Plan



N.T.S. - units in metres

SCHEDULE E





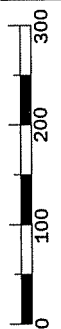
THE PARKS OF WEST BEDFORD

PROTECTING NATURE ENJOYING LIFE

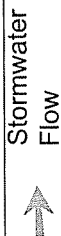
Sub Areas 3&4

May 2012

Stormwater Plan



N.T.S. - units in metres



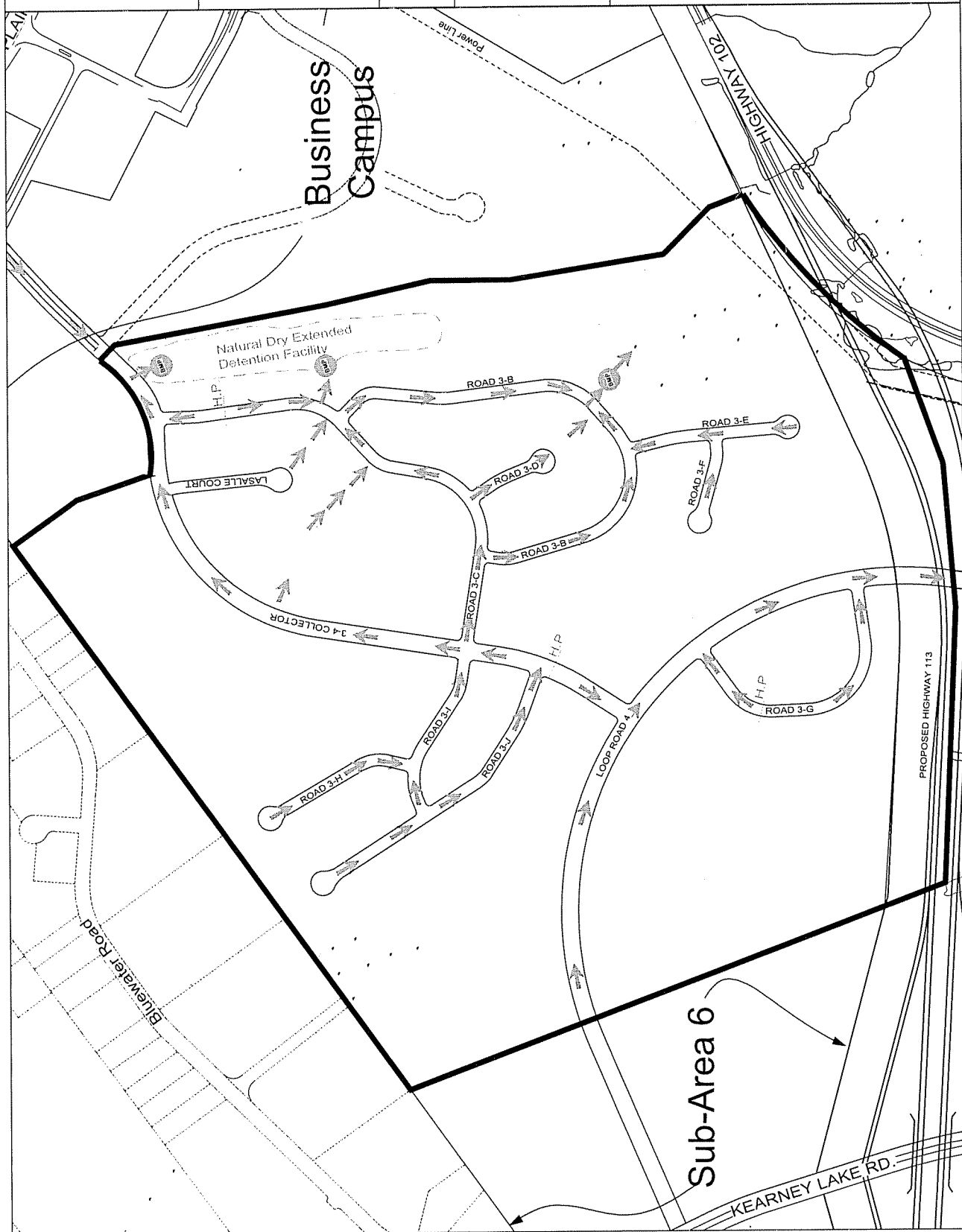
Best Management
Practice, per
Stormwater
Management Plan




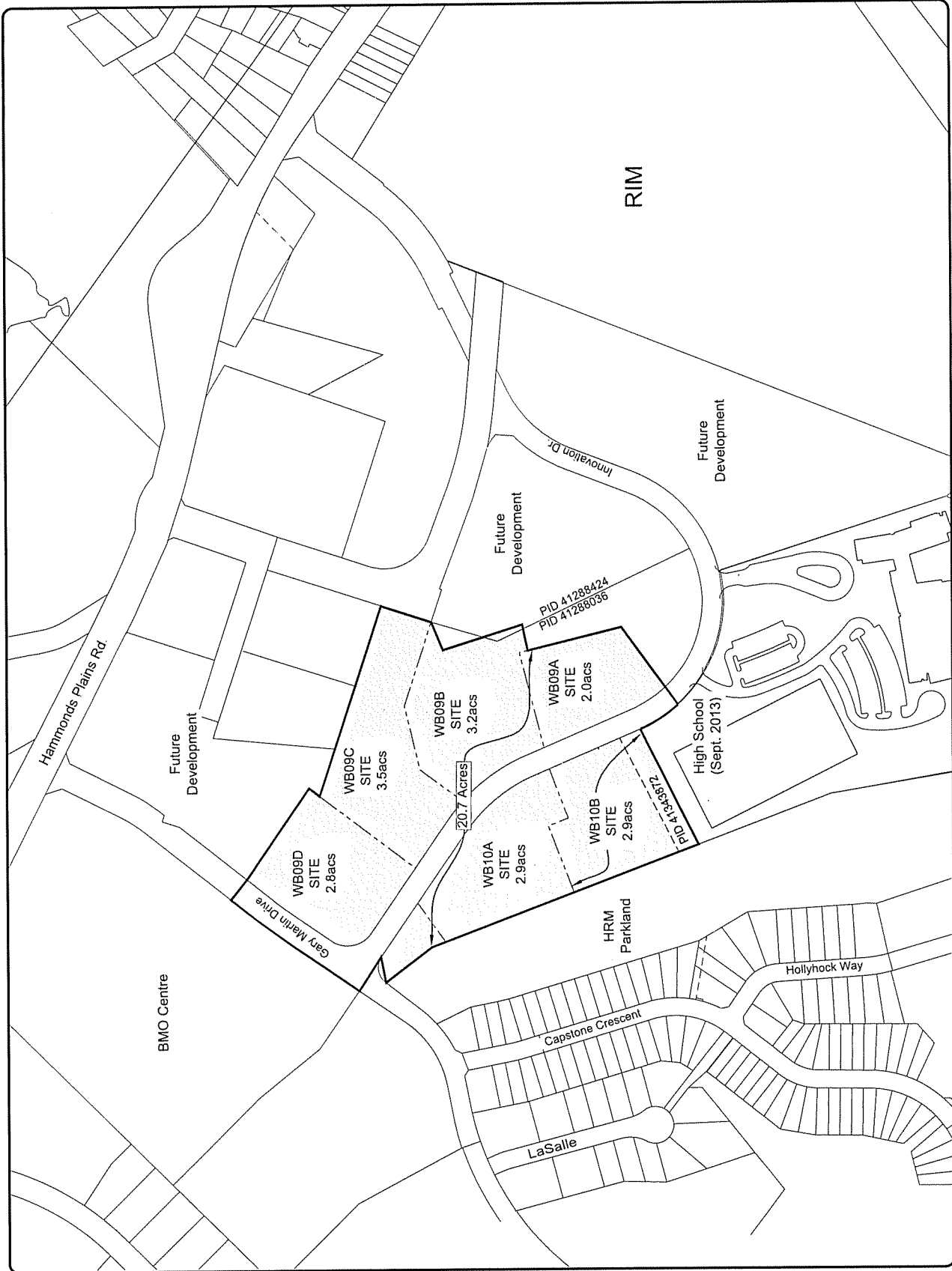
Note:

Stormwater from
Sub-area 4 will be
conveyed to the
stormwater detention
BMP in Sub-area 2.

SCHEDULE G



Gross Area 20.7 acs			
Revision #	Date	January, 2012	
Concept Draft			
DRAWN BY:			
DRAWN			
FILE MULTIPLE-3 BUILDING LAYOUT-A concept plan.dwg			
SCALE 1:1500 (on D Size Sheet)			
CREATION DATE Apr 09, 2012			
PROJECT West Bedford			
DRAWING Context Plan			





Revision #	Date
Concept Draft	January, 2012

DRAWN BY:

DRAWN

FILE
MULTIPLE -3 BUILDING LAYOUT
-A concept plan.dwg

SCALE

1:750 (on D-Size paper)

CREATION DATE

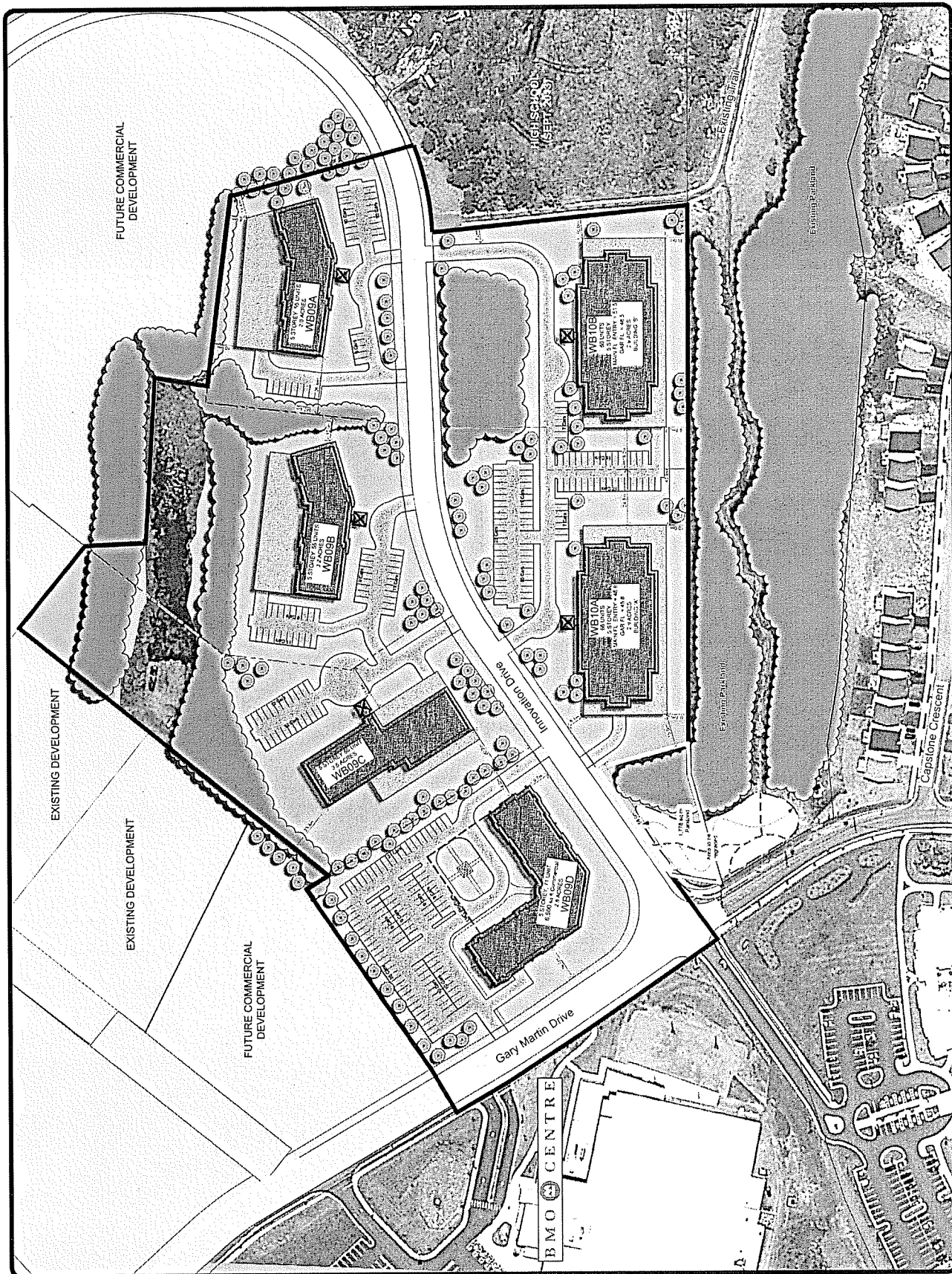
Feb 17, 2012

PROJECT

West Bedford

DRAWING

Concept Plan



Schedule 'C'

Block WB9A - 55 Total Units - 2.0 acres	Gross Area 20.7 acs
Block WB9B - 55 Total Units - 3.2 acres	20.7 x 40 = 828
Block WB9C - 50 Total Units - 3.5 acres	828/2.25 = 368 units
Block WB9D - 71 Total Units - 6,500 sq.ft. Commercial - 2.8 acres	Total Units = 368
Block WB10A - 66 Unit Building - 2.9 acres	
Block WB10B - 66 Unit Building - 2.9 acres	



Revision #	Date

DRAWN BY:	FILE
	MULTIPLE-3 BUILDING
	LAYOUT-A concept plan.dwg
SCALE	1:750 (D Size Sheet)
CREATION DATE	Apr 26, 2012

PROJECT
West Bedford

DRAWING
Conceptual
Site Plan

